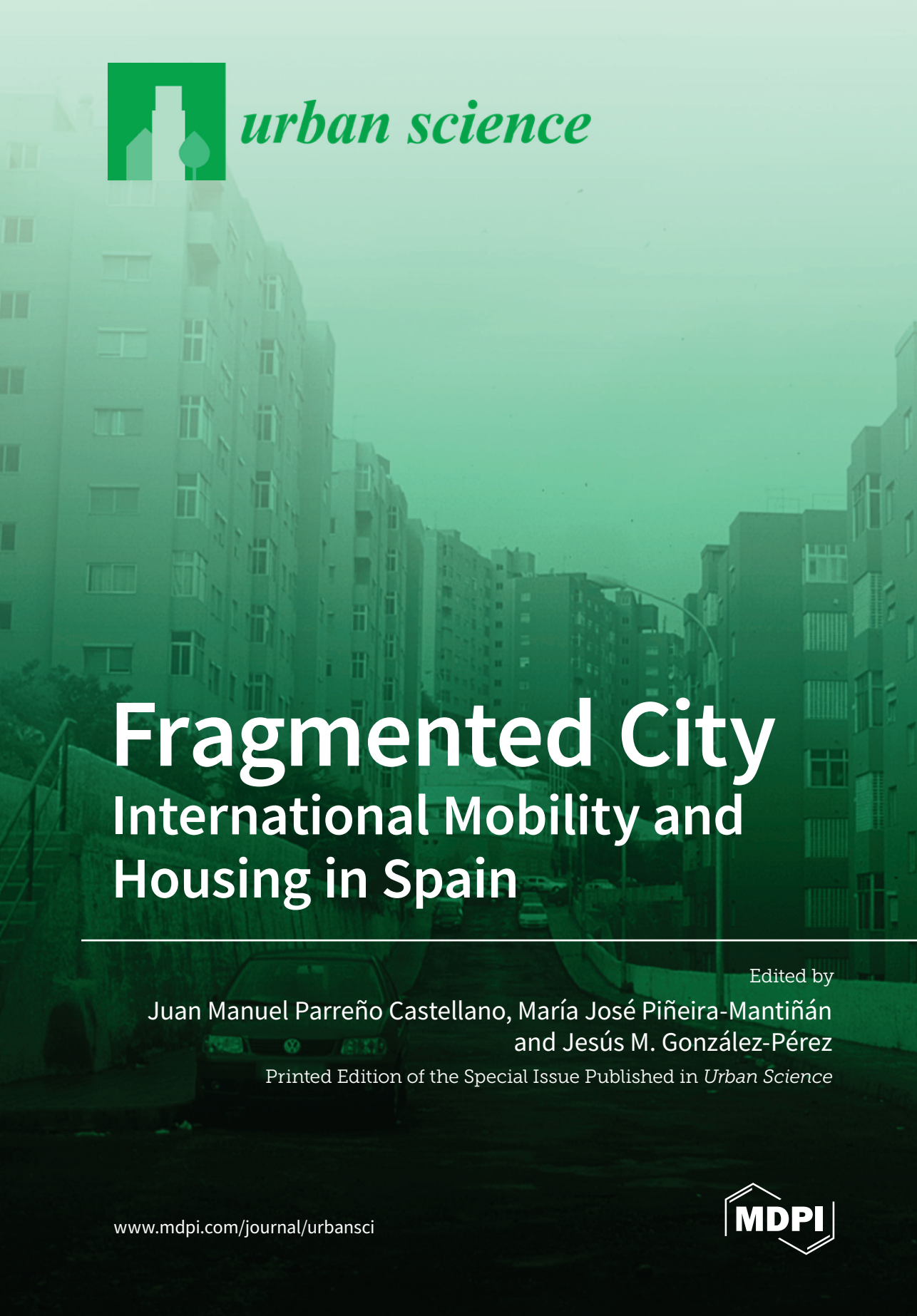


urban science

Fragmented City

International Mobility and Housing in Spain

Edited by

Juan Manuel Parreño Castellano, María José Piñeira-Mantiñán and Jesús M. González-Pérez

Printed Edition of the Special Issue Published in *Urban Science*

www.mdpi.com/journal/urbansci

MDPI

Fragmented City: International Mobility and Housing in Spain

Acknowledgment:

Grant "Housing and international mobility in cities of the Canary Islands: the emergence of new forms of urban inequality" (RTI2018-093296-B-C21) funded by MCIN/AEI/ 10.13039/501100011033 and by "ERDF A way of making Europe".

Grant "Housing and international mobility in cities of the Balearic Islands: the emergence of new forms of urban inequality" (RTI2018-093296-B-C22) funded by MCIN/AEI/ 10.13039/501100011033 and by "ERDF A way of making Europe".

Grant "The housing problem in Spain's fragmented metropolises. Perpetuation over time, new housing markets and solutions from the public administration" (PID2019-108120RB-C31) MCIN/AEI/10.13039/501100011033 and by "ERDF A way of making Europe".

Fragmented City: International Mobility and Housing in Spain

Editors

Juan Manuel Parreño-Castellano
María José Piñeira-Mantiñán
Jesús M. González-Pérez

MDPI • Basel • Beijing • Wuhan • Barcelona • Belgrade • Manchester • Tokyo • Cluj • Tianjin

Editors

Juan Manuel Parreño-Castellano
University of Las Palmas de Gran Canaria
Spain

Jesús M. González-Pérez
University of the Balearic Islands
Spain

María José Piñeira-Mantiñán
University of Santiago de Compostela
Spain

Editorial Office
MDPI
St. Alban-Anlage 66
4052 Basel, Switzerland

This is a reprint of articles from the Special Issue published online in the open access journal *Urban Science* (ISSN 2413-8851) (available at: https://www.mdpi.com/journal/urbansci/special_issues/fragmented_city_international_mobility_housing).

For citation purposes, cite each article independently as indicated on the article page online and as indicated below:

LastName, A.A.; LastName, B.B.; LastName, C.C. Article Title. *Journal Name* **Year**, *Volume Number*, Page Range.

ISBN 978-3-0365-2828-1 (Hbk)
ISBN 978-3-0365-2829-8 (PDF)

Cover image courtesy of Juan M. Parreño-Castellano

© 2022 by the authors. Articles in this book are Open Access and distributed under the Creative Commons Attribution (CC BY) license, which allows users to download, copy and build upon published articles, as long as the author and publisher are properly credited, which ensures maximum dissemination and a wider impact of our publications.
The book as a whole is distributed by MDPI under the terms and conditions of the Creative Commons license CC BY-NC-ND.

Contents

About the Editors

Juan Manuel Parreño-Castellano: Senior Lecturer at the University of Las Palmas de Gran Canaria and Head of the Geography Department since 2014. He has been a Visiting Researcher in the Autonomous University of Madrid, University of Lisbon, and University of Cape Verde. He has published in thirty-seven indexed journals and been author or co-author of eight books and more than eighty book chapters. He has been a researcher in ten funded research projects and more than twenty contracts with public administrations contracts. He has been director of the "Comprehensive Tourism, Interculturality and Sustainable Development Doctoral Program" at the ULPGC and coordinator of the GeoEduca Geography Educational Innovation Group.

María José Piñeira-Mantiñán: Lecturer at the Department of Geography, University of Santiago de Compostela. She has contributed to more than 60 book chapters and 26 indexed journal articles and been a Visiting Researcher at universities in Norway, Ecuador, Italy, France, and Brazil. Vice-Dean of Economic Affairs of the Faculty of Geography and History (University of Santiago de Compostela), Chair of IGU Urban Geography Commission, Vice President of Urban Committee of Spanish Geographers Association and Vice President of Geographers Professional Association in Galicia.

Jesús M. González-Pérez: Full Professor of Geography at the University of the Balearic Islands. President of the Urban Geography Group of the Spanish Geographical Association, AGE, (2014–2021). President of the Spanish Geographical Association since 2021. He has been a Visiting Scholar or Visiting Professor at more than twenty universities, including Stanford (twice); Kansas City, Missouri; Paris 1 (Panthéon-Sorbonne); Glasgow; Bergen; Havana; and São Paulo. He has participated in more than 150 scientific publications as an author or co-author. He has been part of a research team with 21 funded research projects (9 as principal investigator, PI) and 11 contracts (3 PI).

urban science

MDPI

Editorial

Urban Geographies in Transition. A Vision from Spain

Juan Manuel Parreño-Castellano [1,*], María José Piñeira-Mantiñán [2] and Jesús M. González-Pérez [3]

[1] Department of Geography, University of Las Palmas de Gran Canaria, 35003 Las Palmas de Gran Canaria, Spain
[2] Department of Geography, University of Santiago de Compostela, 15782 Santiago de Compostela, Spain; mariajose.pineira@usc.es
[3] Department of Geography, University of the Balearic Islands, 07122 Palma, Spain; jesus.gonzalez@uib.es
* Correspondence: juan.parreno@ulpgc.es

Citation: Parreño-Castellano, J.M.; Piñeira-Mantiñán, M.J.; González-Pérez, J.M. Urban Geographies in Transition. A Vision from Spain. *Urban Sci.* **2021**, *5*, 71. https://doi.org/10.3390/urbansci5040071

Received: 17 September 2021
Accepted: 17 September 2021
Published: 24 September 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

Habitual statements in academic and journalistic fields on the growing inequality of our cities call for multiple reflections. There are numerous indicators of inequality, and territorial specificities give rise to important and subtle differences. What is less debatable is the spatial expansion of inequality (from more outlying, poorer countries to the most developed ones) and its generalization on all scales (from rural to urban areas, and from large metropolises to small cities). Mobility and housing, which inspired the title of this Special Issue, lie at the root of many of these processes, which are represented by phenomena that are often interconnected, such as gentrification and the elite social classes; impoverishment and immigrants in search of work; segregation and refugees; among many others. In this monographic issue, we try to offer a Spanish-based vision of what we call urban geographies in transition—that is, urban geographies in which the key stages, for the purpose of analysis, are the real estate bubble (1996–2007), the subsequent crisis (2008–2013), and the ensuing recovery (2014–2020), without overlooking the impact of the current COVID-19 crisis on the configuration of a new spatial order in cities.

Since the mid-1980s, Spanish economic policy opted for secondary circuits of accumulation and for the financialization of the economy as its main growth mechanisms [1,2], all the while maintaining an advanced process of post-Fordist capitalism. The outcome was the consolidation of an economic system in which real estate speculation became the main means of generating surpluses for economic agents [3] and savings for the population through constant price increases. From the late 1990s, financial credit became the driving force behind this circuit, financing the purchase of housing for a large part of the population. The securitization of loans on secondary markets was used as a mechanism to boost this process [4]. This contributed to high economic growth, a demand for workers in the secondary sector of the labor market, in the building sector in particular, and, by extension, the arrival of high numbers of immigrants. All of this resulted in rising housing prices and high private indebtedness.

When the world crisis hit the United States in 2008, resulting from the bankruptcy of Lehman Brothers Holdings Inc., the Spanish economy was affected by the same patterns. The gigantic real estate bubble burst, with huge knock-on effects on the economy, a drop in housing investment, and big impacts on family wealth, leading, in turn, to a reduction in consumer expenditure. With the credit crunch and financial difficulties faced by purchasers, there was a sharp drop in production activity. All of this represented the end of the so-called "second Spanish miracle".

Among the numerous urban processes that were triggered by these events, four main processes offer insight into Spanish cities: (a) the internationalization of the real estate rental market and the growth of holiday rentals as strategies for mobilizing the toxic assets generated by the previous crisis; (b) new forms of international mobility that are associated with lifestyle migrants and new ways of working; (c) growing segregation, precariousness, evictions, and housing displacement; and (d) the appreciation and growth

of central areas of the city in contrast with the suburban growth phase during the pre-crisis period. Hence, in keeping with the concept coined by Mollenkopf and Castells [5], globalizing neo-liberal capitalism is giving rise to an increasingly dual city. Seen from this perspective, the post-crisis is a new stage of intensified unequal geographical growth in increasingly segregated urban spaces, with higher numbers of precarious areas compared with other, more and more gentrified ones, triggering new emerging conflicts [6]. It should not be forgotten that this growing inequality in urban spaces is a sign of other lingering inequalities that are increasing at a social level in this new scenario of real estate and housing market internationalization in Spain, which has been in progress since the middle of the last decade. This growing duality in urban areas is a sign of rising disparities among the city's inhabitants and is more apparent depending on nationality, income, and gender, with increasing numbers of vulnerable foreign migrants, women, and members of the middle classes [7]. The process of social and urban fragmentation determines social-spatial inequalities and accentuates existing spatial segregation, since it is still a specific form of geographically located segregation based on increasingly polarized, isolated, and different social groups [8].

As the scars of the 2008 crisis were still healing and a new urban and residential scenario was taking shape in Spain, the COVID-19 crisis highlighted the weak structure on which this supposed economic recovery was based and the sharp social inequalities on which it was founded. The virus and the means used to contain it have not only become new indicators of inequality but also brought new signs of old urban problems to light [9]. One good example is the evolution of mortgage foreclosures and evictions due to the non-payment of rent, now key indicators of the social crisis in Spain over the last fifteen years [10–12]. Property seizure proceedings have increased as 2021 advances, and a dramatic increase is envisaged from September 2021, just as the vaccination campaign is starting to contain the pandemic and as economic indicators are improving. According to the Instituto Nacional de Estadística (the National Statistics Office), mortgage foreclosures in Spain rose by 253.2% between April and June 2021 in comparison with the same quarter in 2020. The lockdown, due to the State of Alarm decreed by the government on 14 March 2020, meant that hundreds of these proceedings were brought to a standstill at the Land Registry and law courts; however, it did not prevent the number of foreclosure proceedings from growing for the first time since 2014. The lockdown, in addition to the "social shield" (a series of measures to protect the vulnerable) and the state's anti-eviction decree, halted them during the months of the pandemic. Although the moratorium for certain situations of vulnerability brought about by the pandemic has been extended until 31 December 2021, the return to business and administrative activities has set mortgage foreclosure proceedings in motion once again. These are a reflection of the real estate bubble: a total of 45.9% of the foreclosures initiated in the second quarter of 2021 correspond to homes bought between 2005 and 2008, which is when the price of housing reached historic maximums. In short, as previously mentioned, we are witnessing new signs of old urban problems.

In the Special Issue "Fragmented City: International Mobility and Housing in Spain", many of these new processes are studied, as they are related to changes in Spain's capitalist model and the urban planning and social consequences of the last two decades. In total, this issue is made up of ten articles written by authors from ten universities: eight Spanish and two German ones.

These ten articles can be divided into four main groups based on their subject matter. The first group features two articles that offer a diachronic vision of processes, socioeconomic dynamics, and new mobilities in Spanish cities. One of them, "The Urban Mirror of the Socioeconomic Transformations in Spain" (Domínguez-Mujica, University of Las Palmas de Gran Canaria), stands out for its global analysis and capacity to summarize the situation, since it studies the most significant characteristics of Spanish cities in the post-Fordist capitalist era as a mirror of the economic and social transformations that have led to them. From what might be regarded as a more metropolitan viewpoint,

the article by Gil-Alonso, López-Villanueva, Bayona-i-Carrasco, and Pujadas (University of Barcelona, and Autonomous University of Barcelona) studies population changes in 69 Spanish functional urban areas (FUAs) during the crisis and post-crisis phases, confirming that, during the post-crisis period, the distribution of the inhabitants in urban areas has changed.

The second group deals with the evolution of neo-liberal urban planning in recent decades. It is made up of three articles by Bellet (University of Lleida), Brandis (Complutense University of Madrid), and Hübscher and Ringel (University of Leipzig), featuring case studies of medium-sized Catalan cities, Madrid, and Santa Cruz de Tenerife. All of them show that spatial planning has heralded processes of appreciation and even the city's gentrification.

The third and fourth groups focus on specific subjects and more recent timeframes that can be associated, in general, with the development of unequal cities. The articles by Checa and Nel.lo (Autonomous University of Barcelona) and Alberich, Pérez-Albert, Muro, and Bustamante (University Rovira i Virgili) deal with residential segregation and unequal living conditions. The areas they concentrate on are Catalonia, which is considered from various spatial perspectives, and the city of Tarragona, respectively. Finally, three articles by Parralejo and Díaz-Parra (University of Seville), Domínguez-Mujica, González-Pérez, Parreño-Castellano, and Sánchez-Aguilera (the Universities of Las Palmas de Gran Canaria, the Balearic Islands and Barcelona), and Hof (University of Leipzig) explore touristification, evictions, and gentrification. In all three cases, the authors study recent dynamics on an urban scale, featuring comparative analyses in two chapters (the Andalusian cities of Sevilla and Cádiz and the island cities of Palma in Mallorca and Las Palmas de Gran Canaria in the Canary Islands).

To sum up, this Special Issue offers enriching insights into Spanish cities and Spain's urban geography over the last few decades. This is a field of expertise rooted in a committed, critical approach, and it is steadily adapting to new circumstances, in particular to processes derived from the COVID-19 pandemic, which will no doubt be the focus of future research studies.

Funding: "Housing and international mobility in the cities of the Balearic Islands. The emergence of new forms of urban inequality" (RTI2018-093296-B-C22. State Research Agency, Ministry for Science, Innovation and Universities, and ERDF); "Housing and international mobility in cities in the Canary Islands: the emergence of new forms of urban inequality" (RTI2018-093296-B-C21. State Research Agency, Ministry for Science, Innovation and Universities, and ERDF). "The housing problem in Spain's fragmented metropolises. Perpetuation over time, new housing markets and solutions by the public administration" (PID2019-108120RB-C31. State Research Agency, Ministry for Science and Innovation).

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Harvey, D. The Right to the City. *New Left Rev.* **2008**, *53*, 23–40.
2. Boyer, R. Is a Finance-Led Growth Regime a Viable Alternative to Fordism? A Preliminary Analysis. *Econ. Soc.* **2011**, *29*, 111–145. [CrossRef]
3. López, I.; Rodríguez, E. *Fin de Ciclo. Financiarización, Territorio y Sociedad de Propietarios en la Onda Larga del Capitalismo Hispano*; Traficantes de Sueños: Madrid, Spain, 2010.
4. Fernández, R.; Aalbers, M. Financialization and housing: Between Globalization and Varieties of Capitalism. *Compet. Chang.* **2016**, *20*, 71–88. [CrossRef]
5. Mollenkopf, J.H.; Castells, M. (Eds.) *Dual City: Restructuring New York*; Russell Sage: New York, NY, USA, 1991.
6. Harvey, D. *Rebel Cities. From the Right to the City to the Urban Revolution*; Verso: London, UK; New York, NY, USA, 2012.
7. Domínguez-Mujica, J.; Parreño-Castellano, J.M. A Gender Approach to Housing Loss in Spain: The Case of Las Palmas de Gran Canaria. *Geografie* **2021**, *126*, 123–147. [CrossRef]
8. Vasconcelos, P. Contribuições Para o Debate Sobre Processos e Formas Socioespaciais Nas Cidades. In *A Cidade Contemporânea: Segregação Espacial*; Vasconcelos, P., Correa, R., Pintaudi, M., Eds.; Contexto: São Paulo, Brazil, 2013; pp. 17–37.
9. González-Pérez, J.M.; Piñeira-Mantiñán, M.J. La ciudad desigual en Palma (Mallorca): Geografía del confinamiento durante la pandemia de la COVID-19. *BAGE* **2020**, *87*, 1–42.

10. González-Pérez, J.M.; Vives-Miró, S.; Rullan, O. Evictions for unpaid rent in the Judicial District of Palma (Majorca, Spain): A metropolitan perspective. *Cities* **2020**, *97*, 102466. [CrossRef]
11. Méndez Gutiérrez del Valle, R. Financiarización urbana y burbuja del alquiler en España: Tendencias y contrastes en perspectiva multiescalar. *Doc. Anàl. Geogr.* **2021**, *67*, 1–23.
12. Parreño-Castellano, J.M.; Domínguez-Mujica, J.; Moreno-Medina, C. Real estate dispossession, income and immigration in Las Palmas de Gran Canaria (Spain). *BAGE* **2020**, *87*, 1–38.

urban science

MDPI

Commentary

The Urban Mirror of the Socioeconomic Transformations in Spain

Josefina Domínguez-Mujica

Department of Geography, University of Las Palmas de Gran Canaria, 35003 Las Palmas, Spain; josefina.dominguezmujica@ulpgc.es

Abstract: This study offers an interpretation of the most significant characteristics of Spanish cities in the post-Fordist capitalist era, as a mirror of the economic and social transformations that have led to them, differentiating: (i) the stage of economic expansion at the turn of the century; (ii) the stage of the economic crisis from 2008 onwards; and (iii) the uncertain times we face for the future. Therefore, the aim of this paper is to identify the economic, housing, and political factors conditioning this evolution according to the processes of capitalist accumulation, dispossession, and repossession, and how they shape the social and urban configuration of Spanish cities. A careful selection of urban and economic indicators, its mapping, as well as an in-depth bibliographical review lead to this commentary and make it possible to identify urban developments in Spain in the light of the economic and social transformations of post-industrial capitalism.

Keywords: Spanish cities; economic crisis; financialization; gentrification; housing crisis; post-Fordist capitalism; property bubble; property repossession; touristification; pandemic

Citation: Domínguez-Mujica, J. The Urban Mirror of the Socioeconomic Transformations in Spain. *Urban Sci.* **2021**, *5*, 13. https://doi.org/10.3390/urbansci5010013

Received: 17 December 2020
Accepted: 21 January 2021
Published: 25 January 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the author. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

On 13 July 1986, an article entitled "El niño 5.000 millones será pobre" ("The 5000 million child will be poor") was published in the *El País* newspaper [1], an article that I cut out and photocopied, using the teaching resources of the time, to discuss in class. It said that the baby who officially came into this world on 7 July of that year could be Chinese or Indian and that it was possible that he or she would be born in a village, but it was also likely that he or she would end up leaving the countryside to join those marginalized crowds that settled in the outskirts of the big cities.

Twenty years later, Mike Davis in his book *Planet of Slums* [2] stated that in 2006 a young man would flee his village in West Java to go to the bright lights of Jakarta and that a Peruvian farmer would migrate with his impoverished family from his hometown to one of the countless "pueblos jóvenes" in Lima. These were metaphors for the unstoppable process of the urbanization of the Earth, which, according to Kate D. Derickson, has phagocytized the city and the countryside and involves the complete urbanization of society [3,4]. Thus, although cities only occupy 2% of the planet's surface, they concentrate more than half the world's population, consume 75% of the energy, and produce 80% of the GDP.

This socio-spatial transformation has taken place in the last 30 to 40 years of our history because of an economic, political, and cultural logic that has determined the global expansion of the productive forces and the subsequent annihilation of space by time and of time by space. As we all know, this is a phase of late and post-industrial capitalism that has generated greater urban complexity and has been at the center of innumerable analyses, due to the increase in the quality and quantity of interactions between cities and of the internal relations that take place in the urban fabric itself.

The city has thus responded to globalization, an ambiguous and contradictory process that, while promoting interconnections and convergences, shortens distances and opens up meetings between peoples and social groups, accentuates distances and inequalities. Despite the differences among the various cities on Earth, the qualities inherent in the urban

fabric, at the pace of globalization, are the result of the interaction of two forces. On the one hand, there is the concentration of capital, labor, and culture in the city, and, on the other hand, the radical transformation of its economic base, through the passage from a Keynesian and Fordist system of mass production and consumption to a post-Fordist system of flexible, information-intensive industrialization associated with the vertical disintegration of the production process. This has led to a progressive relocation of some of the industries and the consequent tertiarization of the urban economies, with services now accounting for more than three-quarters or four-fifths of their employment.

The unprecedented concentration of power, wealth, and knowledge, typical of the city at this stage, also brings with it unprecedented social exclusion. Metropolises, technopolises, and globalized regions exchange economic information, technological and human capital resources, and, at the same time, disconnected territories are weakened and dependent, if not excluded from the process of economic development. As a result, vulnerable spaces are consolidated in the city itself, those in which there is increasing risk, more precarious employment, greater insecurity, and a scarce capacity for decision-making, with dynamics of residual characteristics. Parallel to these processes, in the words of Nogué and Romero [5], urban society is configured by an enormous number of groups, differentiated by their interests; social, ethnic, economic, political, sexual, identity, and generational components; lifestyles; access to resources, power, well-being, time, etc., because the city is consolidated as a powerful machine of differentiation and separation, of marginalization and exclusion.

This context is validated by the opinions of such well-known authors as Thomas Piketty [6], Amartya Sen [7], José Antonio Ocampo [8] and the United Nations *Human Development Report* [9], when they pointed out that inequality among nations has been reduced during the third globalization, but inequality has generated within a vulnerable citizen's state of mind "persistent inequalities." These inequalities of income and wealth that define an urban landscape of unbalanced development through increased social polarization and residential segregation do not disappear. Thus, the late-capitalist metropolises, or what some have defined as the dual city, are evolving at a simultaneous pace with the tendencies of capitalism towards equalization and differentiation, and towards devaluation and revaluation, according to the late geographer Neil Smith [10].

In this scenario, the processes of transformation become difficult to comprehend, and it becomes complicated to put forward a discourse on the immediate future. Many authors agree that, in the coming years, incessant urban growth will be accompanied by greater diversity, accentuating complexity, with diffuse, concentrated, and mixed models of urbanization that face the challenge of sustainability. Therefore, before our eyes the urban reality shows that we are its discontinuous and conflictive agents, and times are accelerating at the pace of information and communication technologies, which makes it difficult to understand new situations. As Secchi pointed out [11], in times of transition we are not able to use simple words to speak about the city.

Against this backdrop, a specialist in population geography faces the boldness, rather than the challenge, of interpreting some of the most significant trends in Spanish urban development at this stage of post-Fordist capitalism, trying to differentiate the elements of economic expansion at the turn of the century, those of the economic crisis and of the times of uncertainty with which we look to the future. Consequently, the next sections will identify the economic, housing, and political factors conditioning this evolution because the aim of this paper is to offer a reflection on the transformations of Spanish cities in the light of the evolution of post-Fordist capitalism, characterized by the concatenated processes of accumulation, dispossession, and repossession. With this objective, a methodology based on an in-depth bibliographical review and a selection of different economic and housing indexes was used, providing a comprehensive interpretation of the recent Spanish urban evolution.

2. Materials and Methods

Starting from the premise that urbanization is a relevant expression of the economic, cultural, social, and political characteristics of a society [12], the theoretical reflection that I present was made after consulting many empirical works on recent trends in Spanish urban development. To do this, I proceeded as follows: on the one hand, I selected the books and articles published in scientific journals that were referenced on the Google Scholar portal according to the following topics: economic crisis; financialization; gentrification; housing crisis; post-Fordist capitalism; property bubble; property repossession; Spanish cities; touristification; and pandemic. On the other hand, I reviewed the contributions to the Urban Geography Colloquia promoted by the Association of Spanish Geographers, choosing those that offered an overview, or case studies carried out from a critical perspective. To all of them I added a few articles published in magazines.

The time horizon was 2008 onwards because, although the study deals with the characteristics of the immediately preceding period, I considered that it was necessary to use only the interpretations that were published from that date because they offered a critical perspective in the light of the events that took place after the decline and recession of the global economy and, particularly, of the Spanish economy. Only a few conceptual reflections of notable importance escaped this dating.

Once the collection of these publications was made, a database was created in which the articles were classified according to their chronology and subjects of study, having subsequently chosen those I considered most appropriate for the purposes of this commentary paper. Finally, to all this I added a selection of economic, housing, and property registration indicators, as well as of judicial procedures, to elaborate the figures. To them I added two conceptual schemes of the factors conditioning the economic housing expansion and the economic housing crisis.

3. Results

The conceptual approach to the most significant characteristics of Spanish cities in the post-Fordist capitalism era required consideration of three different stages: (i) the stage of economic expansion at the turn of the century, with the liberalization of mortgages and the land market; the securitization of loans and the expansion of credit; and the promotion of urban land and construction, as sources of funding for institutions; (ii) the stage of the economic crisis from 2008 onwards, with the loss of value of property, dissaving, reduction in income and capital and its consequent effects on dispossession; and (iii) the uncertain times we face for the future, with an incipient economic recovery, with processes of repossession, through the progressive elimination of toxic assets from the financial system and the appearance of new operators—investment funds that acquire, promote, and rehabilitate goods of an urban nature.

3.1. The Urban Configuration in Spain during the Economic Expansion at the Turn of the Century

After the developmentalism of the 1960s, and a long period of diffusion of urban dynamics from the largest cities to the smallest agglomerations, after the crisis of 1973 and later, different economic situations have followed one another in Spain that today can be interpreted in the light of the new tensions of an incipient globalization. This was the prelude to the intense economic growth that we witnessed at the turn of the century; a period that was impossible to dissociate from real estate growth itself and that gave rise to unprecedented urban expansion of a disorderly nature, with a notable increase in artificial surfaces and indiscriminate land consumption. Furthermore, it remained a common trend in southern Europe, where over-urbanization based on hyper-compact and deregulated expansion, real estate speculation, and informal economy were general factors of the cities' growth [13,14].

The increase in artificial land in Spain can be recognized on the map in Figure 1, which represents its variation between 2000 and 2006, according to data from the European CORINE (Coordination of Information on the Environment) Land Cover project. The GDP

Interannual Variation Rate (%) is also represented in the map, but there is not a clear positive correlation between these indicators by provinces, given that the artificial land's increase is also related to the investment in second houses, to foreign investment, and to a process of suburbanization that sometimes exceeds the provincial limits.

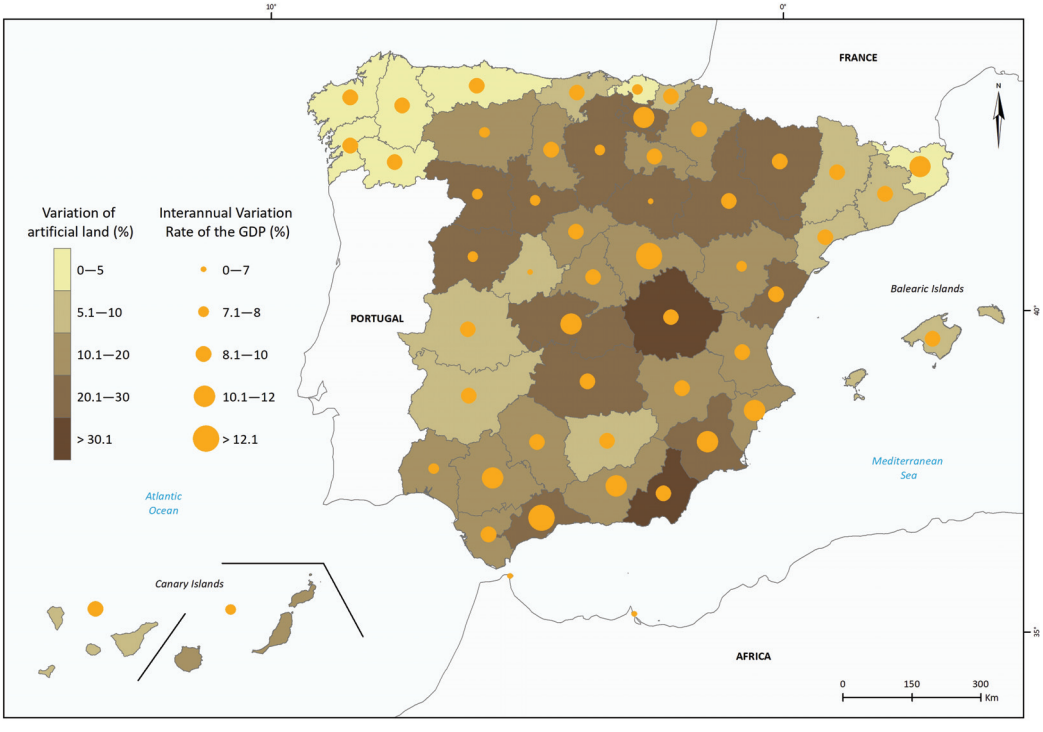


Figure 1. Variation of artificial land (2000–2006)% (source: Digital Atlas of Urban Areas [15]) and Interannual Variation Rate of the GDP (2000–2006)% (source: National Accounts of Spain: Main Aggregates (QNA). Spanish Institute of Statistics (INE) [16]). Author's elaboration.

Consequently, the city at this stage was forged as an image of a real estate bubble, as a result of the business expectations of landowners, developers, and builders and their collusion with the financial system and the political–administrative system, demonstrating what David Harvey [17] defended: that urbanization has been one of the means of absorbing surplus capital and labor throughout the history of capitalism, and that land is not a commodity in itself, but a fictitious form of capital, derived from expectations of future income.

It was the year 2000 when the housing sector began to evolve wildly. Prices were rising by 17% a year with very low inflation, which implied high growth in real terms. Until 2006, an average of 600,000 homes were started each year, a figure higher than that of Germany, Italy, and France combined, according to data from the current Ministry of Transport, Mobility, and the Urban Agenda (Ministerio de Transportes, Movilidad y Agenda Urbana) [18]. Cranes were common in the landscape, almost an element of national pride, in the words of a columnist from *El País* who referred to this situation [19]. However, this increase in housing construction was not accompanied by a reduction in its price; on the contrary, it did not respond to the demographic growth of cities and had disastrous consequences on the indebtedness of households in mortgage loans, a debt that increased by 738% between 1996 and 2007 [20].

This scenario was made possible by the fact that, since the mid-1980s, Spanish policy had been committed to the secondary accumulation circuit and to the financialization of the economy as the main mechanism for growth, taking advantage of the benefits of Spain's recent integration into the European Community (Figure 2).

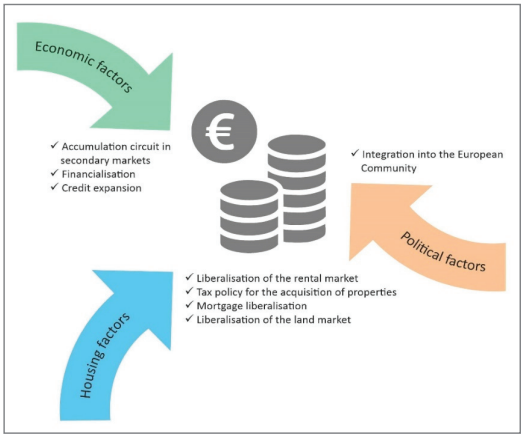


Figure 2. Factors conditioning the economic housing expansion in Spain (1998–2008). Source: author's elaboration.

3.1.1. What Urban Image Does This Period of Prosperity Project?

As opposed to the concentrated model of developmentalism with an over-dimensioned and under-utilized housing stock, the image of a diffuse city with important suburban growth in peripheries where new developments are contrasted with an important consumption of land is opposed to the so-called gothic suburbs, desolate old suburbs, in which less favored social classes reside. This deconcentration, which characterizes this stage, coexists with the evolution of urban centers that are still degraded and aging, affected by the first processes of gentrification, that is, by an incipient transformation of the working-class neighborhoods or empty spaces in the central city into areas for residential, commercial, or service use by the middle class, all of which implies the displacement of low-income social groups.

3.1.2. And What Is the Configuration of Urban Society in These Years of Economic Expansion?

Urban society is one of cultural heterogeneity, which results from the increase in transnational migrations or, as some authors have also defined, from labor migration, that is, the city in which the spaces of flow emerge, in the words of Castells [21]. In addition to this, there is a new social awareness, with the development of values that have contributed to define a more heterogeneous city in terms of ethnicity and culture, with mixed, in-between, border, and contact spaces.

To the ethnic communities and the external image they project, in the use of public spaces, in small businesses, or in the offer of certain services, new social and identity values are added, whose recognition is demanded by homosexuals, transsexuals, and bisexuals in well-defined urban spaces, spaces that they shape. These practices allow us to understand urban entities in a different way, as the Spanish city of this period begins to manifest itself as a city sensitive to the subject and to the personal experiences of women and men; that is, they allow us to make a geography of everyday life, to rescue movement, in the words of David Ley [22] (p. 162): "transnational spaces, yes, but still everyday lives."

These transformations coincide with a change in the labor market pyramid, with visible contrasts between the base of workers with lower incomes and in a more precarious situation, and the managerial–executive social class. This division, although reminis-

cent of the proletariat–bourgeoisie, is more complex, blurred in its limits, with greater overlaps, and less predictable from a political point of view, due to social fragmentation, ideological plurality, and the proliferation of interests found.

3.2. The Impact of the 2008 Global Economic Crisis on the Spanish City

Periodic economic crises and their various manifestations are inherent in the very logic of the capitalist system, since the basic tendency to over-accumulation generates, episodically, surpluses of capital, scarcity of investment opportunities, falling rates of profit, and a lack of effective demand in the market. Consequently, according to Harvey [23], they apply a certain order and rationality to capitalist economic development, since they expand the productive capacity and reintroduce the conditions for a new accumulation, although, at the same time, they lead to dramatic social consequences: financial collapse, forced devaluation of capital assets and personal savings, inflation, a fall in real wages, and unemployment.

The economic crisis that occurred in the United States in 2007 and spread globally due to the bursting of a large financial bubble was a response to this profile. The latter had been forged by the practice by US banks of issuing real estate bonds that offered high profits and low risk through deregulation mechanisms, a procedure that was copied by many other countries, such as Spain. To keep the capital flow of these bonds constant, mortgage loans were granted in bulk, the so-called "subprime" mortgages, but when investors demanded payment of these bonds, interest rates rose because nobody knew what the packages of securities contained. The banks were unable to respond to this demand and a liquidity crisis, a credit crisis, and, as a result, an employment crisis ensued.

In southern Europe, austerity was marked by a shift toward a starker version of neoliberal doctrine, but the crisis did not lead to the reforms expected, at least not in the field of housing [24]. In the particular case of Spain, the system of accumulation of surpluses in the secondary circuit, which had been based on the collaboration of the building–real estate sector, the financial system, and the political–administrative system, turned into over-accumulation when financing contracted in 2008 in the face of a lower outlook for performance, with the consequences of a decrease in demand, greater difficulties for promoters in selling and financing, and a complete contraction of the sector, which affected the economy as a whole [25] (Figure 3).

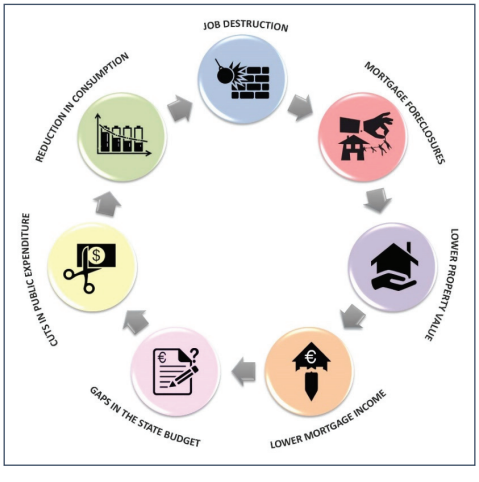


Figure 3. Factors conditioning the economic housing crisis in Spain (2008–2015). Source: author's elaboration.

A good example of the drop in the general housing price, by autonomous communities, in 20081Q–20141Q is shown in Figure 4. This dynamic is related to the fact that, in those autonomous communities where the prices were highest at the beginning of the real estate bubble bust, the fall was greater [26].

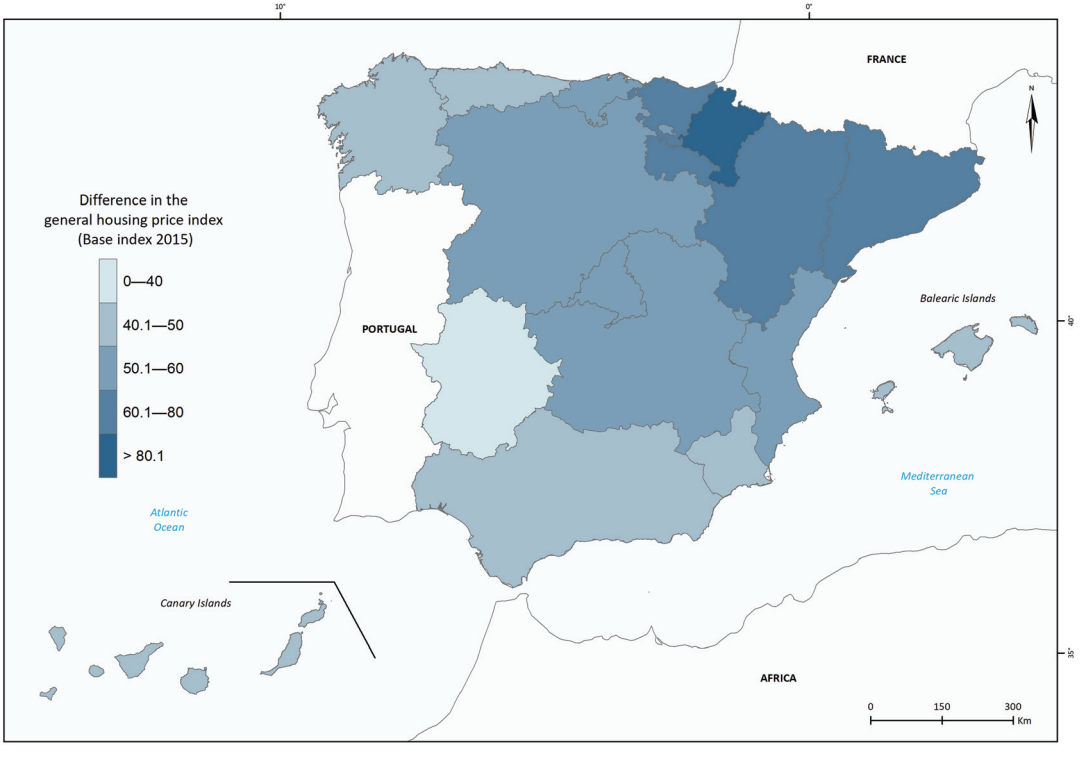


Figure 4. Difference in the general housing price index (Base index 2015) (20081Q–20141Q). Source: Housing Price Index (HPI), National Statistics Institute, Spain (INE) [27]. Author's elaboration.

Otherwise, the economic crisis and rising unemployment led to a dramatic increase in mortgage defaults by buyers. According to Méndez [28], the growing socio-professional precariousness spread to professional groups, to the middle classes, and to territories that seemed immune. Wage devaluation polarized the labor pyramid and increased the distance between its extremes, and the mortgage-holders who could not meet their loans could not use the house as an asset to save the situation, either, because the market prices, which were logically falling, were lower than the mortgage amounts contracted.

This led to a rise in foreclosures and repossessions, although in many cases the assets did not allow the balance sheets of the lending institutions to be restored, given their lower value on the market. Likewise, the worsening economic situation of part of the population put rent payments at risk, so that evictions for non-payment of rent, another side of the same process, were also generated. In other words, according to Romero [29], the virtuous circle of the financial and real estate economy in the expansion stage soon turned into a vicious circle of loss of value, eviction, and reduction of income and capital, with the aggravating factor that an institutional system was not activated to alleviate its devastating social effects, either through the transfer of income or by making payment conditions more flexible.

3.2.1. How Did the Economic Crisis Transfer to the Urban Crisis?

The economic crisis became the urban crisis with the multiplication of ghost housing estates, which spread all over the map of Spain, and the bursting of the real estate bubble. The urbanistic excesses that accompanied it left traces that are difficult to erase: unfinished housing developments, almost completely unoccupied blocks of flats and, around them, the desolation of streets, streetlights, litter bins, and new, unopened playgrounds. In the words of Markel Redondo, the photographer who has traveled all over Spain taking snapshots of some of the many urbanizations and ghost complexes that the brick bubble left all over the country: "To be in those places is strange, you get the feeling of being the last human being on earth, contemplating the ruins" [30]. For the *Málaga Hoy* newspaper, these urbanistic excesses on the Costa del Sol left "a coastline of real estate corpses" [31].

As we all know, the Mediterranean was the area with the greatest volume of flats built, especially Murcia, the Valencian Community and Andalusia, which accumulated the newest empty flats in relation to the total housing stock, and which, in 2017, were still the autonomous communities with the greatest difference between completed homes and new home sales since 2004. In Spain as a whole, even though for several years more new housing was bought than was built, there were still almost half a million unsold homes in 2018, according to data from the Bank of Spain [32].

On the other hand, in Ireland and the USA, after the bursting of the real estate bubble, many buildings were demolished to reduce the supply and because conserving them was more expensive than tearing them down. In Spain, although experts believed that unfinished and badly situated works would be demolished, the Sociedad de Gestión de Activos Procedentes de la Reestructuración Bancaria (SAREB) (Company for the Management of Assets from Bank Restructuring) has not undertaken a clear demolition plan, despite allocating a significant amount to the maintenance of buildings and to works in progress in empty urbanizations. Thus, the ghost developments in the urban peripheries of many Spanish cities have been waiting for someone to decide if the cranes will return, showing the scars of the crisis following the real estate bubble.

3.2.2. What Are the Social Characteristics of the City during the Crisis?

I could say that the social characteristics of the city during the crisis are those of a living and committed city.

According to Edward Soja, urban tensions are among the most explosive in the world in social terms and pose the greatest political challenges [33]. This is how he identified the episodes of racial violence in the United States and they also fit in with the urban manifestations of the so-called "Arab Spring."

There is no doubt that these events are far from the conflict arising from the economic crisis in Spain and its urban repercussions. However, there is some truth in Soya's maxim if we take into account the emergence of certain movements of reaction from the so-called civil society to the evictions due to the non-payment of mortgage loans. The first Platform for People Affected by Mortgages was created in Barcelona in 2009 [34], since the legal framework had been designed to guarantee that banks would collect the debts, while leaving unprotected those people with mortgages who, for reasons such as unemployment or rising fees, were unable to pay.

The Platforms of People Affected by Mortgages, which define themselves as places of meeting, help, and action for those affected, as well as for people who are in solidarity with this reality, have multiplied throughout Spain and developed different campaigns. Among these the STOP EVICTION campaign stands out, in which they are calling for action because, according to their own declarations: "We will not allow any more evictions! We will not let the bank throw us out of our homes!" With a clear urban identity, the movement of the outraged or 15–M was also born, revealing Harvey's maxim that "there is something political in the city air struggling to be expressed" [35] (p. 117).

In this case, the citizens' movement was formed as a result of the demonstration on 15 May 2011, convened by various groups that promoted a series of peaceful protests with the intention of defending a more participatory democracy [36]. It was a movement that generated a public debate on the representativeness of political institutions, electoral rules, dation in payment, transparency in the remuneration of high officials and corruption.

Emerging from the impoverishment created by the economic crisis of the preceding years and from the low expectations of young people, the malaise expressed by its supporters found its main tools of expression in the Internet and social networks. These channels of communication guaranteed its echo throughout the world, with more or less massive demonstrations in London, Paris, Brussels, Rome, Lisbon, Washington, New York, Berlin, Frankfurt, Tel Aviv, Rabat, Wellington, Taipei, Seoul, Tokyo, etc., in a transnational process that was not alien to the activism that launched a criticism of political power and protested against the consequences of the functioning of markets and banks, against cuts, or against precariousness in employment.

3.3. The Capitalist Restructuring of the Spanish City after the Economic Crisis

The political reactions to the 2008 crisis, after an initial moment of denial of the situation, arose from 2010 onwards, when the first measures were taken, focusing exclusively on bank restructuring through the merger of savings banks and their conversion into private banks. Two years later, Bankia and Catalunya Bank were nationalized and SAREB was created, a company aimed at absorbing the toxic assets of the new banks [37]. In other words, through public debt, the losses of the financial institutions were transferred to a semi-public bank, guaranteeing the solvency of the companies through the financial rescue of their toxic assets, but without establishing measures that addressed the problem from the perspective of those affected. Therefore, the issue of abusive floor clauses in mortgages was not resolved; the dation in payment, i.e., the handing over of the mortgaged property in exchange for the cancellation of the debt, was ignored; and the daily drama of evictions, which affected a significant part of the population, was not addressed. For the government, the problem was reduced to the elimination of toxic assets from the financial system, ignoring the growing social unrest that was taking place, until a European ruling was issued in 2017 that forced banks to make the floor clauses totally retroactive.

To these trends we must add the fact that, as of 2013, the progressive sale of these assets began in addition to the recovery of real estate activity (investment, construction, sales, prices) and also the granting of mortgages, while the rental market was reactivated and a policy of attracting international investors began through the granting of tax benefits and the elimination of bureaucratic barriers [38]. New operators appeared, such as the SOCIMIs (Sociedades Anónimas Cotizadas de Inversión Inmobiliaria), which, as listed real estate investment companies, have as their main activity the acquisition, promotion, and rehabilitation of urban assets for lease in a context of im-proved profitability prospects. In addition, investment funds, the so-called vulture funds, took over part of the assets of SAREB and the other financial institutions at more than advantageous prices, through instruments such as the Real Estate Management Companies [39].

This internationalization of home ownership through a policy that ensured a favorable benefit for large international investors, powerful economic agents, and financial institutions was the final step in its financialization and is the necessary requirement for understanding that it has gone from a model of accumulation to one of accumulation by dispossession and subsequent repossession. In other words, the idea already expressed by Neil Smith that neoliberalism turns cities into centers of production for the global economy [40] increasingly eliminates the functions of social reproduction and uses them as a test bed for the new entrepreneurship; a facet of hardcore capitalism that accentuates the process of the commodification of the city is fulfilled.

Two other factors have added to this panorama of the internationalization of housing and are having a great impact on the property market and, therefore, on the restructuring

of the city after the crisis. I am referring to the so-called Golden Visa and the so-called collaborative or platform or network economy.

Law 14/2013, of 27 September, on the support for entrepreneurs and their internationalization, established a special residence visa for investors, commonly known as the Golden Visa, which allows any large investor in real estate (worth EUR 500,000 or more) to live for one year in the entire national territory and includes a work permit [41]. The Golden Visa also permits the holder to bring his or her family members to Spain.

Since this program was launched, the number of permits has been increasing year by year. In total, 8061 of these visas were granted in 2019 [42] and, according to data from the Ministry of Labour, Migrations and Social Security and the Ministry of Foreign Affairs, European Union and Cooperation, at the top of the list of foreigners who decide to invest in Spain and, in exchange, obtain a work and residence permit, are Chinese, Russian, Ukrainian, Iranian, American, Mexican, Venezuelan, Indian, Brazilian, etc., citizens who choose, preferably, properties in Madrid, Barcelona, and Málaga in absolute terms, and in the Mediterranean provinces and the two archipelagos in relative terms (Figure 5).

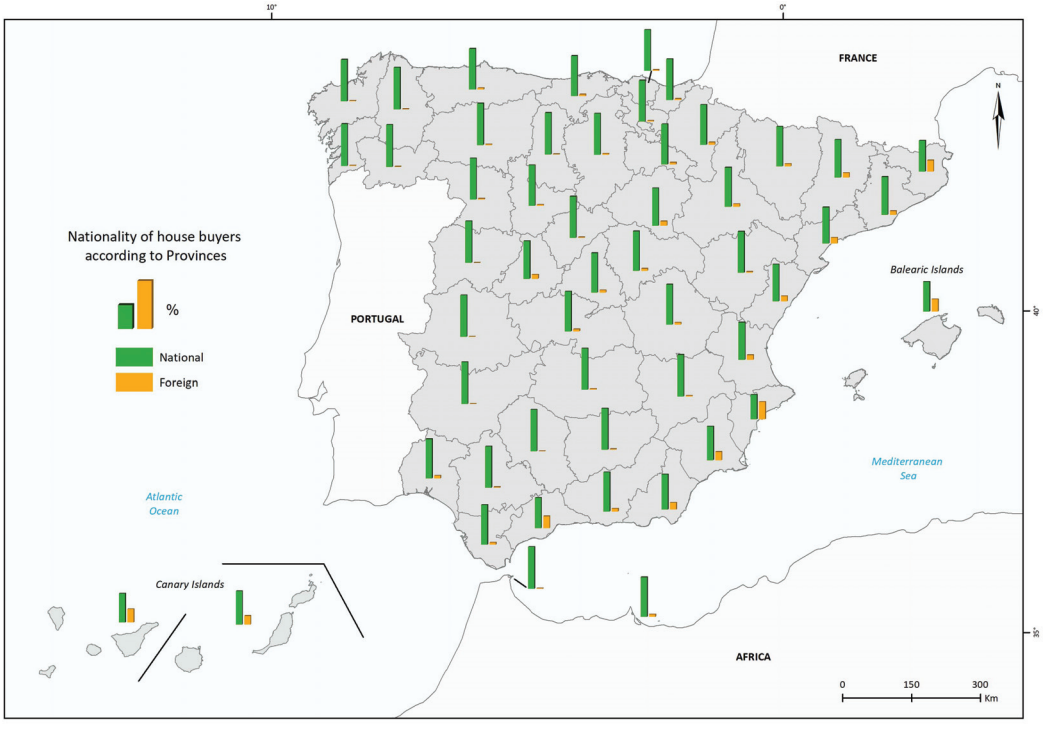


Figure 5. Housing buyers according to their nationality (%) by Spanish provinces in 2019. Source: Association of Property Registrars of Spain [43]. Author's elaboration.

Chinese investments are well-known in our country and are some of the most solid. So much so, that many real estate agencies have a unique division for this Asian country. In fact, until 2018, some Chinese citizens had managed to invest up to EUR 821 million in Spain in exchange for more than 1200 residence permits, a third of the total granted. They were followed by Russians and Ukrainians, two of the traditional nationalities who acquire, above all, homes on the Mediterranean coast.

Finally, the presence of large Venezuelan fortunes in the Spanish real estate market shot up in 2017 and 2018, due to the political and economic situation the Latin American country was going through, with purchases of luxury properties that are generally paid in cash and

reach up to EUR 30 million. Although these fortunes have always been interested in Spain, as evidenced by the fact that Novagalicia Banco was awarded by the FROB (Fondo de Reestructuración Ordenada Bancaria) to the Venezuelan group Banesco in 2013 [44], for the last three or four years there has been a sharp increase in Venezuelan buyers and investors, especially in Madrid's Golden Mile, in the heart of the Salamanca district. As a result of these real estate investments by non-EU foreigners and foreigners from European Union countries, Spain was leading the southern European real estate recuperation in 2017 [45]. Thus, Figure 6, which represents the evolution (by quarters) of the housing prices and of the housing acquisitions by foreigners between 2014 and 2019, allows us to appreciate that in the generalized increase in housing prices due to the Spanish economic recovery, the sustained evolution of foreign investment has also favorably contributed.

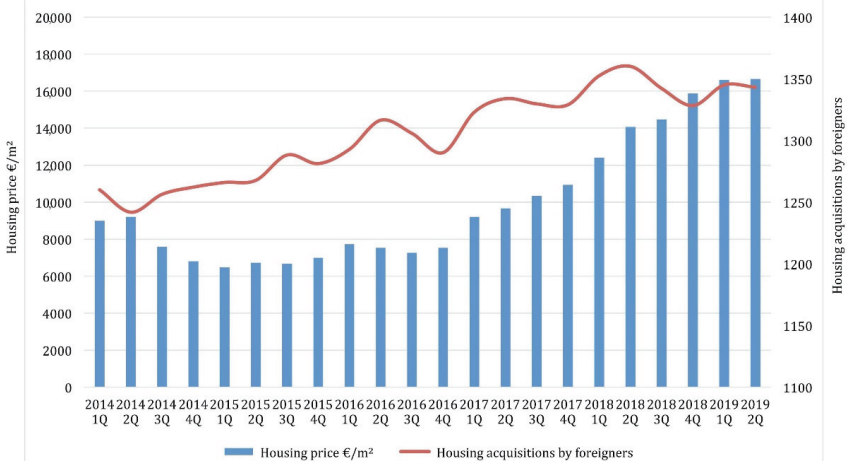


Figure 6. Evolution (by quarters) of the housing prices and of the housing acquisitions by foreigners. Sources: Tinsa, appraisal company approved by the Bank of Spain [46]. Association of Property Registrars. Real Estate Registry Statistics [43]. Author's elaboration.

The second factor I mentioned is that of the collaborative economy. As we all know, this is a new business model which, by means of Web platforms, allows services to be exchanged for money, taking a commission. The platform that best exemplifies this philosophy in relation to our interests is Airbnb. It was originally created in San Francisco, in 2008, to rent homes with an inflatable mattress and breakfast (air bed and breakfast) to guests who were passing through the city, which gave the company its name.

The development of this platform, as a start-up, attracted the attention of a business financier and several investment funds, which injected large sums of capital into it. As a result, the initiative landed in every tourist place on Earth and the company became one of the eight global giants in technology, so other similar companies supported the initiative, such as Home Away or Booking Home.

The rental of housing for tourist uses as an activity of this cool economy has had a negative impact on the housing market, as it remove from the offer many of the properties that were intended for permanent residential use, since it is a more lucrative business than the traditional rental one. This, in turn, implies processes of displacement and social elitization in city centers as well as an increase in second homes, as opposed to traditional neighborhoods. Consequently, while the number of tourist dwellings has increased, especially in the coastal provinces and in the two archipelagos, there has also been a high number of evictions, as depicted in Figure 7, so that both variables show a non-parametric correlation (Spearman = 0.785).

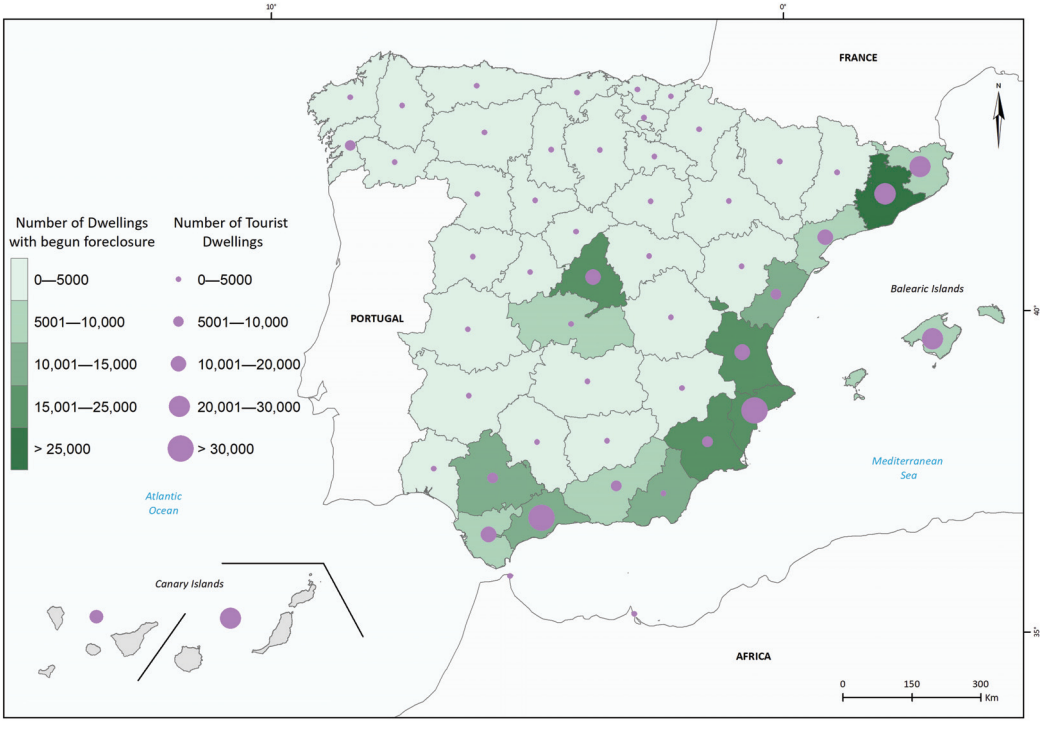


Figure 7. Tourist dwellings by province in absolute figures in 2020, and number of dwellings with foreclosure begun by province, 2014–2019. Source: Measurement of the Number of Tourist Dwellings by Province. National Statistics Institute (INE) [47], and Dwellings with Foreclosure Begun by Province. National Statistics Institute (INE) [48]. Author's elaboration.

According to Ian Brossat [49], this new platform capitalism represents an advance that even the best dreams of neoliberalism 20 years ago did not foreshadow, since, although it began by putting people who needed accommodation in contact with others who could provide it, it included economic exchange and turned collaboration into transaction, externalizing costs and risks and basing this economic activity on deregulation.

The above processes have been recognized in the whole of southern Europe, where critical urban scholarship has made large use of gentrification, touristification, and financialization to explain the impacts of crisis, austerity, and subsequent economic rebound driven by the real estate and tourist sectors [50].

3.3.1. Which Signs of Urban Restructuring Characterize These Moments of Repossession?

Signs of urban restructuring include a process of strengthening tertiary specialization, urban recentralization, and residential and tourist gentrification.

The analysis of the territorial dynamics in Spain based on the microdata of the Residential Variation Statistics carried out by Otero et al. [51] showed that the cities have recovered a clear leadership in the post-crisis stage. Therefore, from the point of view of flows, they have been much more attractive than peri-urban, ex-urban and rural areas. That is to say, the suburban and counter-urban scenarios, and the revitalization of the so-called empty or emptied Spain, which acquired a certain prominence during the period of prosperity, have shown great volatility. Therefore, as opposed to the years of suburbanization and transformation of metropolitan areas, we are today witnessing a stage of "return to the compact city" or, at least, this was the case until the pandemic appeared. Hence, our gaze is

directed at the dynamics, tensions, and conflicts that are taking place in the central spaces of Spanish cities.

In recent years, the process of residential elitization that has affected urban centers has been accompanied by an increase in dispossession and repossession. If in the toughest years of the crisis, evictions for unpaid mortgage payments were concentrated in areas of recent urbanization, in the residential peripheries of most cities, evictions for non-payment of rent have been common in urban centers. According to Domínguez et al. [52], although it is true that the development of tourist housing is not a direct factor in eviction in general terms, there is a territorial relationship between the presence of this form of tourism and the loss of property ownership and use.

There is no doubt, therefore, that the tourist gentrification that was activated in the post-economic crisis is impacting on the housing market of the compact city, given the increase in rent and the price of property owned, which makes it inaccessible to the lower income segments of the population to purchase or rent. In addition to these changes related to housing, there are also transformations in commerce, and a phenomenon of urban artificialization, due to the effects of tourism.

Cities tend to offer an image of homogeneity, which is identified with a place for tourist visits, with the aim of satisfying the interests of those visitors, while at the same time consolidating itself as a space-museum in which it is possible to enjoy what makes it peculiar or different in the eyes of the tourist. Thus, for example, the central supply markets are losing customers to the supermarkets, so they are reinvented as gourmet spaces, while at the same time being the object of guided tours with the sole purpose of providing tourists with a photograph of the local products that they take with their mobile phones.

In this scenario, it should be remembered that the ex novo tourist developments gave rise to urban tourist forms that were different from urban entities. However, the transformative potential that tourism is exercising today in consolidated cities makes the boundary between tourist and urban spaces much more blurred, as well as the very conception of what we understand by the term "city".

Finally, these trends of urban restructuring in recent times, in line with the so-called third globalization, are causing a great challenge from the perspective of scale, given that the forces of internationalization of real estate capital, whether of investment companies, the fortunes of individuals mobilized in the search for niches of stability, or online business platforms, are contrasted with a municipal management that has to resolve the local interests of multiple actors: neighbors, small traders, owners of conventional tourist establishments, etc., which is a difficult undertaking for public servants when they want to look after the interests of citizens.

3.3.2. Which Social Transformations Are Taking Place in This Incipient Post-Crisis Period? Are We Capable of Recognizing Them?

The right to the city, defined by Henri Lefebvre [53] as the right of urban dwellers to build, decide, and create the city, and to make it a privileged space of anti-capitalist struggle, loses force in times of what Ulrich Beck defined as the risk society [54] and Zygmunt Bauman called liquid modernity [55], that is, in moments of vulnerability as well as of fluidity, hybridization and flexibility. Could the post-crisis urban society be defined as a liquid citizenship? Is this interpretation sufficient to describe the society of the Late-Capitalist City or of the third globalization?

I believe that the answers to these questions are not simple, because as I pointed out earlier, while we are moving toward devaluation and revaluation, we are also moving toward equalization and differentiation. There is no doubt that we are living in times of temporariness, to which the deterioration of the labor market, the loss of employment or increase in unemployment, the precariousness of work and temporariness, the spread of discontinuous labor trajectories, marked by chronic insecurity, low income, and the absence of prospects for improvement have definitely contributed.

This is compounded by the wage devaluation caused by the labor market reform of 2012 [56], which leads to a lack of social protection, a situation of vulnerability that is inherent in the neoliberal mode of regulation. However, citizens are also anxious about novelties and incessant changes, and so they see tourists multiplying in cities, becoming themselves urban tourists from other cities; grouping themselves according to diverse interests and demands, of identity, gender, lifestyles; and coexisting in societies where mobility and immigration are resumed, diversified, and intensified, until the moment of the pandemic.

The capacity for adaptation and flexibility in the face of new situations also hides resistance and acts of demonstration, promoted by protest platforms that fight for the right to housing, demanding legislation for holiday homes, for the construction of social housing, for the regulation of the rental market, and for the penalization of owners of empty houses.

The interests of the different platforms are mixed in such a way that those who lead the demands for the right to housing, also demand improvements in pensions, another of the distinctive signs of the city of our times, the city of demographic aging; or they form part of groups that demand urban measures to make cities more sustainable, from the point of view of greenhouse gas emissions or of mobility.

It can be said that the result of all this is complexity and lack of definition, since this capacity to respond, this collective will to shape the city, is affected by the resistance of capital and its spokespersons, making it increasingly difficult to develop the necessary political strategy to invoke dignity through a pact between humanity and technology, in what have come to be called the human-centered smart cities [57].

As Méndez pointed out [58], the great challenge of the present will involve promoting structural change by building cities that are more intelligent in terms of their economic base, their socio-labor structure, and their public management; but also, cities that are more livable by reducing problems of exclusion, improving the quality of the built space, and reducing their ecological footprint. Only in this way, according to the Global Platform for the Right to the City [59], will we citizens become actors building a more dignified city together.

4. Conclusions. The Uncertain Future of the Spanish City in Times of Pandemic

The reflections that guided this study were affected by an unexpected pandemic expansion that has modified our perception of the world and our habits of life, and whose urban impact we are still unable to evaluate. In this context we must express the following questions: Have cities and their neighborhoods been punished with the same epidemic and socioeconomic intensity? What will the Spanish cities' next generation be like in an era where physical contact between people is restricted? Will there be notable changes in the socioeconomic structure that guides urban evolution? I believe we are in a position to answer these questions negatively, as the images of the so-called "hunger queues" speak for themselves. This was already expressed by Ana Fani A. Carlos [60] when she said that the virus is deepening the social crisis in an unequal way. This unequal dimension is related not only to the contagion, but also to the economic, social, political, and institutional substrate that in some places accentuated the destructive capacity of the pandemic and its consequences, while in others it found greater defenses against its impacts [61].

There is no doubt that COVID-19 has reached planetary dimensions because, in a globalized world, preventing transmission seems impossible. For this reason, we must reflect on environmental conditions, density factors, the age composition of the population, mobility, productive structures, and city government, but we are still a long way from providing a reasonable interpretation of these questions. However, despite this lack of knowledge and the widespread crisis that the pandemic has caused, there are some positive changes, which should be highlighted. From a socioeconomic point of view, it is worth mentioning the generalization in the use of information and communication technologies. The distance working model, distance training, and online commerce have been reinforced in addition to other services, such as the health service itself, which has also adopted

new forms of provision. Business digitalization has increased, and the production and marketing activities of certain local businesses have been strengthened, particularly in the agro-food sector.

From a socio-political point of view, there has been empowerment of the public sector, given that there has been a growing control in the management of daily life by central, regional, and local government authorities. At the same time, cooperation has been consolidated, as demonstrated by the agreements reached within the European Union, health coordination initiatives between autonomous communities and other urban governance actions. From an environmental point of view: gas emissions and pollution have been reduced; proposals to promote sustainable tourism have multiplied and local tourism has been strengthened; but there has been a decrease in the use of public transport, with some revitalization of the private car and of bicycles and skateboards.

From an urban point of view, there is a new tendency to oppose the strategies to rein-force compact cities. These last were defended before the pandemic, trying to avoid urban expansion and land occupation in the peripheries. Nonetheless, in the current times most citizens show a preference for suburban areas and small urban centers identified as being safer spaces. Finally, from the point of view of housing, some legislative initiatives have been developed to curb the tendency toward foreclosures and evictions in times of unemployment and social vulnerability.

The above transformations characterize these times of pandemic, but it is difficult to predict whether they will continue in the future. I am confident that, on the post-pandemic horizon, the positive circumstances can become an opportunity to face the challenges in the transition of Spanish cities toward intelligent urban planning models, especially regarding energy and environmental issues. Nevertheless, we must not forget the disparate inequality of the pandemic effects, geographical evidence that we will have to study in depth, following the advice of Iván Serrano et al. [62] when they paraphrased Chesterton [63], pointing out that geography has, more than ever, the task of thinking with a perspective beyond immediacy and drawing up a common agenda in which we consider what's wrong with the world.

Funding: This work was supported by the European Regional Development Fund (ERDF)/the Ministry of Science, Innovation and Universities–State Research Agency (AEI) under R&D Project "Housing and international mobility in cities of the Canary Islands. The emergence of new forms of urban inequality" (RTI2018-093296-B-C21).

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: Not applicable.

Data Availability Statement: Raw data are publicly available.

Conflicts of Interest: The author declares no conflict of interest.

References

1. De la Fuente, I. El niño 5.000 millones será pobre. *El País*, 13 July 1986; 24.
2. Davis, M. *Planet of Slums*; Verso: London, UK, 2006.
3. Derickson, K.D. Urban geography I: Locating urban theory in the 'urban age'. *Prog. Hum. Geogr.* **2015**, *39*, 647–657. [CrossRef]
4. Derickson, K.D. The annihilation of time by space. *Urban Geogr.* **2020**, *41*, 487–491. [CrossRef]
5. Nogué i Font, J.; Romero González, J. *Las Otras Geografías*; Tirant lo Blanch: Valencia, Spain, 2012.
6. Piketty, T. About capital in the twenty-first century. *Am. Econ. Rev.* **2015**, *105*, 48–53. [CrossRef]
7. Sen, A. Teorías del desarrollo a principios del siglo XXI. *Rev. Centroam. Econ.* **2000**, *17*, 57–58.
8. Ocampo, J.A. Las concepciones de la política social: Universalismo versus focalización. *Nueva Soc.* **2008**, *215*, 36–61.
9. PNUD. *Informe Sobre Desarrollo Humano 2019. Más Allá Del Ingreso, Más Allá de Los Promedios, Más Allá Del Presente: Desigualdades Del Desarrollo Humano en el Siglo XXI*. 2020. Available online: http://hdr.undp.org/sites/default/files/hdr_2019_overview_-_spanish.pdf (accessed on 16 December 2020).
10. Smith, N. *Uneven Development: Nature, Capital, and the Production of Space*; University of Georgia Press: Athens, GA, USA, 2010.
11. Secchi, B. *La Ciudad de Los Ricos y la Ciudad de Los Pobres*; Los libros de la Catarata: Madrid, Spain, 2015.
12. Hall, P. The future of metropolis and its form. *Reg. Stud.* **1997**, *31*, 211–220. [CrossRef]

13. King, R.; Proudfoot, L.; Smith, B. *The Mediterranean, Environment and Society*; Arnold: London, UK, 1997.
14. Carlucci, M.; Grigoriadis, E.; Rontos, K.; Salvati, L. Revisiting a hegemonic concept: Long-term 'Mediterranean urbanization' in between city re-polarization and metropolitan decline. *Appl. Spat. Anal. Policy* **2017**, *10*, 347–362. [CrossRef]
15. Ministry of Transport, Mobility, and the Urban Agenda. Digital Atlas of Urban Areas. 2020. Available online: http://atlasau.fomento.gob.es/#s=2000-2006;l=es;i=suevar.varart001;v=map5 (accessed on 16 December 2020).
16. National Statistics Institute Spain (INE). Quarterly National Accounts of Spain: Main aggregates (QNA). Results. Available online: https://www.ine.es/dyngs/INEbase/en/operacion.htm?c=Estadistica_C&cid=1254736164439&menu=resultados&secc=1254736157760&idp=1254735576581 (accessed on 18 January 2021).
17. Harvey, D. *The Limits to Capital*; Verso Books: London, UK, 2018.
18. Fernández-Cuesta del Río, A. *La Burbuja Inmobiliaria: Causa o Efecto de la Crisis: Repercusión Del Estallido de la Burbuja Inmobiliaria Sobre la Crisis Económica*; Documento de Trabajo; Universidad Pontificia de Comillas: Madrid, Spain, 2015; Available online: https://repositorio.comillas.edu/jspui/bitstream/11531/4637/1/TFG001338.pdf (accessed on 16 December 2020).
19. López Letón, S. La burbuja que embriagó a España. *El País*. 25 October 2015. Available online: https://elpais.com/economia/2015/10/20/actualidad/1445359564_057964.html (accessed on 16 December 2020).
20. Etxezarreta Etxarrri, A.; Hoekstra, J.; Dol, K.; Cano Fuentes, G. De la burbuja inmobiliaria a las ejecuciones hipotecarias. *Ciudad Territ. Estud. Territ.* **2012**, *44*, 597–613.
21. Castells, M. Space of flows, space of places: Materials for a theory of urbanism in the information age. In *The City Reader*, 7th ed.; LeGates, R.T., Stout, F., Eds.; Routledge: London, UK, 2020; pp. 572–582. [CrossRef]
22. Ley, D. Transnational spaces and everyday lives. *Trans. Inst. Br. Geogr.* **2004**, *29*, 151–164. [CrossRef]
23. Harvey, D. The Right to the City: From Capital Surplus to Accumulation by Dispossession. In *Accumulation by Dispossession: Transformative Cities in the New Global Order*; Banerjee-Guha, S., Ed.; SAGE: New Delhi, India, 2010; pp. 17–32.
24. Annunziata, S.; Lees, L. Resisting 'austerity gentrification' and displacement in Southern Europe. *Sociol. Res. Online* **2016**, *21*, 148–155. [CrossRef]
25. Parreño-Castellano, J.M.; Domínguez-Mujica, J.; Armengol-Martin, M.T.; Boldú-Hernández, J.; Pérez-García, T. Real estate dispossession and evictions in Spain: A theoretical geographical approach. *Boletín Asoc. Geógrafos Españoles* **2019**, *80*, 1–25. [CrossRef]
26. García Montalvo, J. Dimensiones regionales del ajuste inmobiliario en España. La economía de las regiones españolas en la crisis. *Pap. Econ. Española* **2013**, *138*, 62–79.
27. National Statistics Institute Spain (INE). Housing price index (HPI). Base 2015. Available online: https://www.ine.es/jaxiT3/Tabla.htm?t=25171&L=1 (accessed on 18 January 2021).
28. Méndez Gutiérrez del Valle, R. Crisis económica, vulnerabilidad urbana y desempleo en España. *Ciudad Territ.* **2013**, *45*, 649–667. [CrossRef]
29. Romero, J. Construcción residencial y gobierno del territorio en España. De la Burbuja especulativa a la recesión. Causas y consecuencias. *Cuad. Geográficos* **2010**, *47*, 17–46.
30. Cantó, P. Los estragos de la burbuja del ladrillo, vistos desde el aire. *El País*. 16 April 2018. Available online: https://verne.elpais.com/verne/2018/04/14/articulo/1523714033_978947.html (accessed on 16 December 2020).
31. Atencia, J.M. El litoral de los cadáveres inmobiliarios. *Málaga Hoy*. 22 November 2015. Available online: https://www.malagahoy.es/malaga/litoral-cadaveres-inmobiliarios_0_974002928.html (accessed on 16 December 2020).
32. Alves, P.; Urtasun, A. Evolución reciente del mercado de la vivienda en España. *Artículos Analíticos Boletín Económico* **2019**, *2*, 2019.
33. Soja, E. Tensiones urbanas: Globalización, reestructuración económica y transición postmetropolitana. In *Edward W. Soja: La Perspectiva Postmoderna de un Geógrafo Radical*; Benach, N., y Albet, A., Eds.; Icaria Editorial: Barcelona, Spain, 2010; pp. 210–233.
34. Mangot Sala, L. 2. La Plataforma de Afectados por la Hipoteca. De la Crisis a la Estafa. Del Prozac al Empoderamiento. *Clivatge. Estud. Testimonis Sobre Confl. Canvi Soc.* **2013**, 56–88. Available online: https://revistes.ub.edu/index.php/clivatge/article/view/1002 (accessed on 16 December 2020).
35. Harvey, D. *Rebel Cities: From the Right to the City to the Urban Revolution*; Verso Books: London, UK, 2012.
36. Minguijón Pablo, J.; Pac Salas, D. La primavera española del movimiento 15M. *Política Gob.* **2013**, *20*, 359–389.
37. Gutiérrez, A.; Domènech, A. Spanish mortgage crisis and accumulation of foreclosed housing by SAREB: A geographical approach. *J. Maps* **2017**, *13*, 130–137. [CrossRef]
38. Méndez Gutiérrez del Valle, R. *Ciudades en Venta. Estrategias Financieras y Nuevo Ciclo Inmobiliario en España*; Universidad de Valencia: Valencia, Spain, 2019.
39. De La Paz, P.T.; Peña Cuenca, I. Spanish REITs: The new regulated SOCIMIs. In *Real Estate Investment Trusts in Europe*; Sotelo, R., McGreal, S., Eds.; Springer: Berlin/Heidelberg, Germany, 2016; pp. 177–194. [CrossRef]
40. Smith, N. El redimensionamiento de las ciudades: La globalización y el urbanismo neoliberal. In *Capital Financiero Propiedad Inmobiliaria y Cultura*; Museu d'Art Contemporani de Barcelona, Universitat Autónoma de Barcelona: Barcelona, Spain, 2005; pp. 59–78.
41. Ampudia de Haro, F.; Gaspar, S. Visados dorados para inversores en España y Portugal: Residencia a cambio de dinero. *Arbor* **2019**, *195*, a495. [CrossRef]

42. Aranda, J.L. España Bate Por Séptima Vez el Récord de Visados Dorados: Entregó Más de 8.000 en 2019. *El País. Economía*. 18 May 2020. Available online: https://elpais.com/economia/2020-05-18/espana-bate-por-septima-vez-el-record-de-visados-dorados-entrego-mas-de-8000-en-2019.html (accessed on 16 December 2020).
43. Association of Property Registrars (Registradores de España). Estadística Registral Inmobiliaria. 2019. Available online: https://www.registradores.org/documents/33383/148210/ERI_Anuario_2019.pdf/902e281f-e147-3c4f-f5ef-3cddf2b12629?t=1589953778564 (accessed on 16 December 2020).
44. Echagüe Pérez-Montero, M. La Estructuración de la Banca en Galicia. Master's Thesis, Universidade da Coruña, A Coruña, Spain, 2014. Available online: https://ruc.udc.es/dspace/bitstream/handle/2183/12459/EchaguePerezMontero_Mar%C3%ADa_TFM_2014.pdf (accessed on 16 December 2020).
45. Savills Aguirre Newman. España Lidera la Recuperación de la Inversión Inmobiliaria en el Sur de EUROPA. Noticias. Available online: https://www.savills-aguirrenewman.es/publicaciones/noticias/225706/espa%C3%B1a-lidera-la-recuperacion-de-la-inversion-inmobiliaria-en-el-sur-de-europa (accessed on 16 December 2020).
46. Tinsa. Appraisal Company Approved by the Bank of Spain. Evolution of the Housing Prices. Available online: https://www.tinsa.es/precio-vivienda/ (accessed on 16 December 2020).
47. National Statistics Institute Spain (INE). Measurement of the Number of Tourist Dwellings by Province. Available online: https://www.ine.es/experimental/viv_turistica/exp_viv_turistica_tablas.htm (accessed on 24 January 2021).
48. National Statistics Institute Spain (INE). Dwellings with Begun Foreclosure by Province. Available online: https://www.ine.es/dyngs/INEbase/es/operacion.htm?c=Estadistica_C&cid=1254736176993&menu=resultados&idp=1254735576757#!tabs-1254736195324 (accessed on 16 December 2020).
49. Brossat, I. *Airbnb: La Ciudad Uberizada*; KataKrak Liburuak: Pamplona, Spain, 2019.
50. Tulumello, S.; Allegretti, G. Articulating urban change in Southern Europe: Gentrification, touristification and financialisation in Mouraria, Lisbon. *Eur. Urban Reg. Stud.* **2020**. [CrossRef]
51. Otero-Enríquez, R.; García Abad, J.; Domínguez-Mujica, J.; Pérez-Caramés, A. Inmigración y dinámicas territoriales en España: Crisis y recuperación (2008–2017). *Anu. CIDOB Inmigr.* **2019**, 190–217. [CrossRef]
52. Domínguez-Mujica, J.; Parreño-Castellano, J.M.; Moreno-Medina, C. Vacation Rentals, Tourism, and International Migration: Gentrification in Las Palmas de Gran Canaria (Spain) from a Diachronic Perspective. In *Handbook of Research on the Impacts, Challenges, and Policy Responses to Overtourism*; IGI Global: Hershey, PA, USA, 2020; pp. 237–260. [CrossRef]
53. Lefebvre, H. *Le Droit à la Ville*; Anthropos: Paris, France, 1968; Volume 3.
54. Beck, U. World risk society as cosmopolitan society? Ecological questions in a framework of manufactured uncertainties. *Theory Cult. Soc.* **1996**, *13*, 1–32. [CrossRef]
55. Bauman, Z. *Liquid Modernity*; Polity Press: London, UK, 1999.
56. Baylos, A. La desconstitucionalización del trabajo en la reforma laboral del 2012. *Rev. Derecho Soc.* **2013**, *61*, 19–41.
57. Andreani, S.; Kalchschmidt, M.; Pinto, R.; Sayegh, A. Reframing technologically enhanced urban scenarios: A design research model towards human centered smart cities. *Technol. Forecast. Soc. Chang.* **2019**, *142*, 15–25. [CrossRef]
58. Méndez Gutiérrez del Valle, R. Construir ciudades más inteligentes y habitables. *Gac. Sind. Reflexión Debate* **2019**, *32*, 353–370. Available online: https://www.researchgate.net/publication/338147089_Construir_ciudades_mas_inteligentes_y_habitables (accessed on 16 December 2020).
59. Plataforma Global Por el Derecho a la Ciudad. El Derecho a la Ciudad. Construyendo Otro Mundo Posible. Guía Para su Comprensión y Operacionalización. 2016. Available online: https://www.right2city.org/wp-content/uploads/2019/09/R3.1_el-derecho-a-la-ciudad_construyendo-otro-mundo-posible-1.pdf (accessed on 16 December 2020).
60. Carlos, A.F.A. (Ed.) A 'revolução' no cotidiano invadido pela pandemia. In *COVID-19 e a Crise Urbana*; Serviço de Biblioteca e Documentação Faculdade de Filosofia, Letras e Ciências Humanas da Universidade de São Paulo: São Paulo, Brazil, 2020; pp. 10–17. [CrossRef]
61. Del Valle, R.M.G. *Sitiados Por la Pandemia. Del Colapso a la Reconstrucción: Apuntes Geográficos*; Revives: Madrid, Spain, 2020; Available online: http://revives.es/wp-content/uploads/2020/09/SITIADOS-POR-LA-PANDEMIA.pdf (accessed on 16 December 2020).
62. Serrano, I.; Cámara, C.; March, H.; Ribera-Fumaz, R.; Ruiz-Mallén, I.; Saatorra, M. Lo Urgente y lo Importante: Una Reflexión Desde Las Geografías Urbanas de la Pandemia. In AGE: Reflexiones Sobre la Crisis Covid-19. 2020. Available online: https://www.age-geografia.es/site/wp-content/uploads/2020/04/hug-v1.pdf (accessed on 16 December 2020).
63. Chesterton, G.K. *What's Wrong with the World*; Ignatius Press: San Francisco, CA, USA, 1910.

urban science

MDPI

Article

Towards an Even More Spatially Diversified City? New Metropolitan Population Trends in the Post-Economic Crisis Period

Fernando Gil-Alonso [1,*], Cristina López-Villanueva [2], Jordi Bayona-i-Carrasco [1,3] and Isabel Pujadas [1]

[1] Department of Geography, University of Barcelona, 08001 Barcelona, Spain; jordibayona@ub.edu (J.B.-i.-C.); ipujadas@ub.edu (I.P.)
[2] Department of Sociology, University of Barcelona, 08034 Barcelona, Spain; clopez@ub.edu
[3] Centre for Demographic Studies, Autonomous University of Barcelona, 08193 Bellaterra (Barcelona), Spain
* Correspondence: fgil@ub.edu

Abstract: After the deep economic crisis that began in 2008, in 2014, Spain started to show signs of recovery, entering the so-called "post-crisis" period. Though it has not yet reached the entire population, economic improvement has had a positive impact on the real estate market, economic activity, and employment. Residential mobility has also increased, but flows have become more unstable and complex. The direction of these flows, the reasons for moving, and the ages and socioeconomic categories of migrants have diversified. These complex "new mobility" patterns are reconfiguring the spatial distribution of the population in Spanish urban areas. On the basis of Continuous Register (Padrón Continuo) microdata, this paper primarily aims to study population changes in the 69 Spanish functional urban areas (FUAs) defined by the National Institute of Statistics (INE)/Eurostat, focusing on their population growth or decline in their centers and peripheries during the crisis (2011–2015) and post-crisis (2015–2019) phases. Then, the paper analyzes the five major Spanish metropolises (Madrid, Barcelona, Valencia, Seville, and Bilbao) in greater depth. The findings confirm the hypothesis that, during the post-crisis period, the population growth of cores and rings and thus the spatial distribution of urban inhabitants have been changing, resulting in the growing demographic heterogeneity of Spanish urban areas that are diversifying both internally and compared to each other.

Keywords: population growth; spatial reconfiguration; large urban areas; post-crisis period; Spain

Citation: Gil-Alonso, F.; López-Villanueva, C.; Bayona-i-Carrasco, J.; Pujadas, I. Towards an Even More Spatially Diversified City? New Metropolitan Population Trends in the Post-Economic Crisis Period. *Urban Sci.* **2021**, *5*, 41. https://doi.org/10.3390/urbansci5020041

Academic Editor: David Plane

Received: 1 March 2021
Accepted: 4 May 2021
Published: 14 May 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

The economic growth that Spain was experiencing after the mid-1990s abruptly ended in 2008 because of the global economic and financial crises. These exacerbated deindustrialization and globalization processes and favored inequality, which has grown in recent decades in both Spain and the majority of other capitalist countries [1]. In fact, this recession was partly caused by global financial markets that intended to maximize short-term benefits by investing in a secondary accumulation market linked to urban space production. These massive financial transactions targeted housing markets and produced a real estate bubble that, when it burst, triggered an economic recession in Spain, with the public and private debt crisis being another component. This observed urban basis of the economic crisis explains why the most negative effects were concentrated in large cities, reflecting the vulnerability of urban spaces [2].

This economic recession also affected international migration, Spain's main driver of population and urban growth, at the beginning of the 21st century. The previous highly positive migratory growth became negative [3], return flows slightly increased, and the number of young Spaniards moving to other European countries also rose. In addition, the economic crisis had an impact on residential mobility by reducing suburbanization flows [4,5] and increasing the attractiveness of urban cores [6,7].

The literature on the effects of the economic expansion and crisis on residential flows and urban dynamics extensively covers the Spanish context [4,5,8–10], particularly its two main urban regions, Madrid and Barcelona [11–17]. However, few studies have analyzed the consequences of the post-crisis economic recovery on urban dynamics.

Indeed, in 2014, the country started to show signs of economic recovery [18]. Economic activity and employment levels progressively rose, which had an impact on the real estate market [19]. Simultaneously, residential mobility levels seemed to recover while socio-residential strategies began to diversify [20], subsequently transforming interactions between intra-metropolitan spaces [21].

Thus, together with changes in the economic cycle, Spanish urban areas shifted from unprecedented population growth to stagnation and once again, more recently, to a new population growth phase that abruptly ended due to the impact of the COVID-19 pandemic. Still a scarcely studied period, this brief recovery phase between around 2014 and March 2020, the period studied herein, seems to have its own specificities. Residential mobility flows did not regain their pre-economic crisis characteristics, becoming more unstable, complex, and fragmentary [22]. This means that the direction of movement, migrants' reasons for moving, their socio-economic categories, and their ages all diversified, as did their impacts on Spanish urban cores and rings.

Therefore, our primary hypothesis is that, during the post-crisis period, Spanish urban areas experienced a great diversity of situations regarding the population growth of their cores and rings and that of whole metropolises. In other words, some city cores grew more than their peripheries, while, in other cases, suburbanization prevailed. At the same time, although the metropolitan population as a whole rose (again) in some areas, it continued to decline in others, as in the previous crisis period. Analyzing the population growth in Spanish urban areas while establishing a typology based on the increase and decline in core and peripheral populations, both in the economic crisis and post-crisis phases, is the first aim of this paper.

A secondary objective is to study the population growth and decline in the municipalities of the five largest Spanish metropolises for the same two four-year periods. Whereas the first part of the paper focuses on whether population change was diversifying among Spanish metropolitan areas in the post-crisis period, the second part analyzes whether this population growth heterogeneity increased within them.

2. Theoretical Background

Uneven population growth between the core and ring, this paper's main subject, has been extensively studied and modeled, giving rise to the stages defined by the urban development model [23–26]. In short, the model claims that urban areas go through a series of successive stages depending on whether cores or rings grow and on whether the entire urban area increases or decreases. Therefore, the following four stages are extracted from the model: (1) urbanization or centralization; (2) suburbanization or decentralization, (3) desurbanization or counterurbanization, and (4) reurbanization. These four phases are also cyclical, returning to the first phase after the end of the fourth. This cyclical model also helps to explain internal migration between urban centers and peripheries, as core–periphery interactions are reconfigured at each urban population growth phase [27,28]. However, this model has been heavily criticized because empirical research has shown that it presents some major drawbacks [29–32]. For example, many urban areas show non-linear trajectories [29]; that is to say, the four phases do not always follow one another in the order that the model indicates [30]. Moreover, in a given country, some urban areas can be in the suburbanization phase while others are reurbanizing [31]. Simultaneously, it can include instances of both urban growth and shrinkage [32,33]. This diversity among urban areas, which is not explained by the model, can also be found within urban areas, as many suburban towns grow while the populations in their urban cores recover. This simultaneous suburbanization and recentralization may be caused by peripheries receiving inhabitants from city cores, which, in turn, are growing because of immigration from

outside the urban area. These external flows are not adequately captured by the theoretical model of cyclical urban growth, which treats urban regions as closed systems. However, international migrants are not the only ones attracted to urban cores. Other groups, such as young adults, non-family households, and some parts of the middle to upper classes, have also shown a preference for living in city centers in the last decades, whereas young couples with children still tend to move to suburban peripheries. The residential behaviors of families explain why population growth is still higher in the suburbs than in the city cores in most urban areas [30].

Therefore, patterns of population growth and decline in different urban areas and within major metropolitan areas (in cores versus rings) cannot be explained by a cyclical urbanization model but rather by a series of external factors acting on urban areas. For example, economic development and, more specifically, economic cycle phases (expansion, crisis, recession, and recovery) influence urban growth and decline in multiple ways. They act directly through their influence on natural growth [34,35] and, above all, on internal and external migratory growth [21,22]. However, they also have an indirect effect on other mechanisms, such as the housing market, the labor market, family transformations, and changes in socio-residential patterns.

Starting with the housing market, urban development in general and residential and international migration flows in particular are highly dependent on the institutional factors affecting the way that housing market mechanisms function [36], including mortgage access [37] and public housing policies [38,39]. In fact, they are all conditioned by the current economic cycle phase of the country. For example, in Spain, as in other European Mediterranean countries, it is considerably difficult for young people, as well as certain immigrant groups, to afford housing [40]. These difficulties worsened when the economic crisis subsided because of rising purchase and rental prices, particularly in large cities [41]. Although household construction slightly picked up and it was easier to get a mortgage during the post-crisis period, these changes were not able to compensate for this housing affordability problem. On the contrary, financial globalization has favored a rise in prices since housing has become an attractive investment option for small investors and particularly for large funds, rather than satisfying a basic need [42,43]. In some large city neighborhoods, the transformation of dwellings into a financial asset has intensified gentrification [44]. Tourist pressure or "touristification" has also become an additional constraint [45–48] that causes that part of the housing stock is no longer used for residential purposes but rather for tourism demands, thereby reducing the housing supply. All of these processes linked to the housing market have led to a price rise, especially in large cities, resulting in increased residential mobility. Indeed, the growing problems related to housing accessibility and affordability in urban centers have displaced some of their residents, especially in the most attractive neighborhoods. This could be a possible explanation, at least in part, for the renewed native and immigrant population suburbanization flows that occurred during the post-crisis period. For example, after recentralizing during the economic crisis years, Latin American immigrants decentralized once again during the recovery years [49].

The labor market and, more specifically, the impact of economic cycles on the levels of labor insertion of foreign immigrants and native workers have also influenced changes in urban population via international and internal mobility [33]. There are two opposing hypotheses on this issue. The first, based on the "buffer theory" [50–52], claims that foreigners act as buffers that absorb labor market tensions. Therefore, during economic growth phases, the number of immigrants rises as a response to an increasing demand for workers. However, in deep economic crisis periods, they are expelled from the labor market in greater numbers than native workers. By contrast, the second hypothesis [53], based on a "new migration model" [54], maintains that, in developed countries, labor markets constantly need foreign workers to fill low-wage and unstable jobs. With this hypothesis, these immigrants, mainly from developing countries, replace national workers, even during recession periods. This is especially the case in countries with highly dual labor markets [55], such as those of Southern Europe in general [56] and Spain in particu-

lar [57,58], where foreign immigrants have filled occupational niches in low-added-value economic sectors, such as construction, tourism, intensive agriculture, and the care of elderly people.

Which hypothesis best explains foreign immigrants' behavior in Spain during the 2008 economic crisis? Evidence shows that migrants behaved differently depending on their origin. On the one hand, Africans and Asians seem to have responded better to the "new migratory model," as they have barely left Spain: Quite to the contrary, their numbers increased during that period. On the other hand, the "buffer theory" seems to better explain the behavior of Europeans and, particularly, Latin Americans [59]. The latter immigrant group left Spain in the greatest numbers during the economic crisis, either returning to their homeland or moving to a third country [60]. Similarly, Latin Americans are also the origin group for which the number of entries to Spain increased the most during the post-crisis period. This shows their great capacity to adapt to economic cycles and, therefore, to impact population growth and decline in Spanish urban areas, where they tend to concentrate.

In addition, due to their greater labor and housing instability, foreign immigrants, who have lower rates of home ownership, have higher internal migration rates compared to natives [61,62]. Indeed, due to the economic recession, many foreigners either changed their places of residence inside the country, migrating to provinces that suffered less from the economic crisis, or moved from one metropolitan municipality to another. Research carried out in the metropolitan areas of Barcelona and Madrid has shown that there was a recentralization of foreign migrants, particularly Latin Americans, as urban cores had more rental housing stocks, better public transport, and more jobs than peripheral municipalities. These features also explain the increasing attractiveness of urban cores and the reduced suburbanization flows among Spaniards during the recession period. The end of the economic crisis stimulated new suburbanization flows by these groups, which had already been moving to peripheries during the years of economic expansion before 2008 [4,5,49].

Nevertheless, residential mobility does not only respond to temporary fluctuations in the economic cycle. On the contrary, it varies for different reasons, some of which are more structural in nature. This is the case, for instance, of residential moves related to biographical events, that is, address changes caused by life course transitions, such as leaving parental homes, couple formation, birth of a new child, or retirement [63,64]. Another example is household and family transformations linked to the Second Demographic Transition model [65]. The increasing numbers of union break-ups [66] and of more unstable household types, such as single-parent and one-person households [67], among other changes, influence people's residential mobility decisions. Classical contributions, such as Frey and Kobrin [68] or Buzar et al. [69], have provided in-depth knowledge on such issues. Finally, other authors have underlined that family relations, called *entourage* by Bonvalet and Lelièvre [70], also have an impact on migration. This would be the case for residential movements seeking family support.

These two connected factors—the increasing numbers of life cycle transitions and of more unstable household types compared to previous decades—could lead to the hypothesis that residential mobility has increased around the world. However, this is not the case for all types of mobility or for all geographical contexts [71]. For example, in some developed countries, residential mobility rates are presently lower than before [72]. In Spain, residential mobility levels have traditionally been lower than those of other European countries, and they decreased even more during the recession years, largely because fewer foreign immigrants (who change addresses more frequently than Spaniards) were arriving in Spain and fewer natives were leaving their parental homes and forming new families. The latter was caused by the "empty" cohorts—those born in the decades of low fertility (1980s and 1990s)—reaching adulthood [62].

Along with changes in housing and labor markets and family transformations, urban mobility has also been influenced by socio-residential pattern modifications. This relationship works in both directions since residential changes between (or within) cores

and rings also modify the demographic and social composition of the different parts of urban areas [73]. In addition to population growth and decline (this paper's main subject), mobility flows cause changes in age structure (rejuvenation or aging [74]) and have an impact on socioeconomic spatial distribution patterns, which can be measured by social class, income, or education level.

Several studies show the existing interaction between residential mobility and the spatial distribution patterns of the urban population by the socioeconomic characteristics of residents. In other words, it is a determinant of segregation and polarization processes in urban areas [75–77]. The literature analyzing urban socio-residential segregation in Spain's metropolitan areas is relatively extensive. Several recent studies focused on the cases of Barcelona and Madrid (either the cities or the whole metropolitan areas) [39,78–82] or analyzed the case of Catalonia [83]. However, few have related socio-residential restructuration dynamics to residential mobility patterns [84,85], and most of them have focused on specific case studies: Madrid [17], Barcelona [86,87], Paris [88], or Buenos Aires [89], among others.

Similar to segregation, socio-spatial polarization is also produced by socioeconomic inequality. This polarization is related to urban space through mechanisms and structures, such as the way that the productive system works, existing social structure tensions, wealth distribution policies, and, as already mentioned, real estate market characteristics and housing policies [90]. In this sense, certain authors have claimed that rising socio-spatial polarization has produced a process called "the suburbanization of poverty," leading to increased wealth in urban cores to the detriment of peripheries [73]. Some researchers have analyzed it as an independent phenomenon [91,92], while others have related it to gentrification [76,93]. This issue is not addressed in this paper. However, if the suburbanization of poverty is confirmed, the resulting greater spatial polarization could be related, as both a cause and a consequence, to growing intra-metropolitan residential mobility levels in the post-crisis period, to which the COVID-19 health crisis put an end.

3. Data and Methodology

The main aim of this paper is to study the demographic reconfiguration of Spanish urban regions during the post-crisis period from a municipal perspective. To this end, current population dynamics are compared to those of the previous economic crisis phase, focusing on the population growth or decline in the metropolitan city core and periphery. The criterion used to define the spatial units analyzed in this paper is that of functional urban areas (FUA) set by the Spanish National Institute of Statistics (INE, Madrid, Spain) and Eurostat. A functional urban area is a group of municipalities around a city, linked to it by commuting. The delimitation of FUAs considers the main city and its area of influence, or hinterland, as an integrated labor market and consumption area. Commuting between a city and its neighboring municipalities has been used to set the limits of the area of influence. The main selection criterion for a municipality is that at least 15% of its residents move daily to the city to work or study. There are exceptions to the general rule for very small municipalities. Though commuting remains the main criterion, others, such as contiguity, are also taken into account. The number of FUAs with more than 100,000 inhabitants has increased in Spain, from 45 in 2011 to 69 in 2019, which are analyzed in this paper. The advantage of using this definition is that it allows comparisons with the rest of the European urban areas [94].

The present research used microdata from the Padrón Continuo, an administrative population register that records each municipality's residents, as its main data source. The National Institute of Statistics (INE) coordinates the collection and depuration of local data and publishes official population figures on 1 January every year. It also offers basic population data on the age, sex, place of birth, and nationality for all Spanish municipalities.

Cumulative annual growth rates (CAGRs) were calculated for both periods discussed in this paper. The first, ranging from 1 January 2011 (the highest population figures around the beginning of the economic crisis) to 1 January 2015 (the lowest population figures

around the end of the crisis), is called the "crisis phase" in this paper; the second, lasting from 1 January 2015 to 1 January 2019 (the last official data available at the time of writing the paper), is the "post-crisis" phase.

The following formula was used to calculate the cumulative annual growth rates:

$$r = \left(\sqrt[n]{\frac{P_{i+n}}{P_i}} - 1 \right) * 100 \quad (1)$$

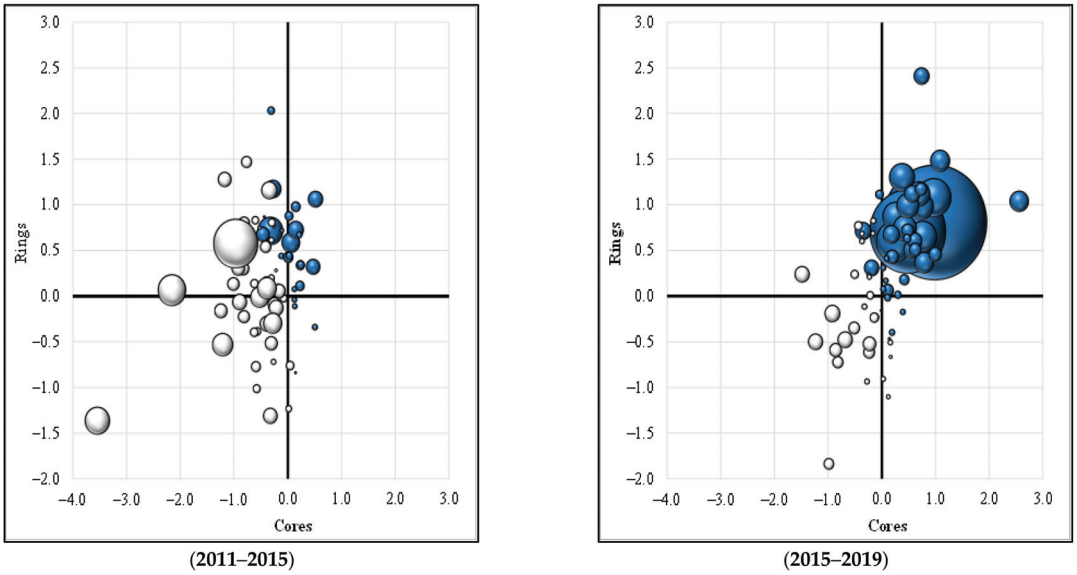
where n represents the number of years, P_i is the initial population, and P_{i+n} is the final population of the area under study.

4. Results

4.1. Population Growth in the 69 FUAs: Growing Diversity among Urban Areas

4.1.1. Urban Cores versus Peripheries: Comparing Economic Crisis and Post-Crisis Phases

Figure 1 shows annual growth rates for metropolitan cores and peripheries in both periods analyzed (for the complete dataset, see Appendix A, Table A1). Very significant and outstanding differences can be observed between the two intervals. In the economic crisis phase, most Spanish FUAs lost population (white spheres). Only 23 out of the 69 FUAs analyzed gained inhabitants (blue spheres). The largest group, containing 33 cases, experienced a combination of urban core population loss and peripheral population growth. In another 18 metropolitan areas, both cores and suburban municipalities lost population. There were just 12 cases where both areas of the FUAs gained residents, and only six urban cores grew as their peripheries lost inhabitants. In sum, between 2011 and 2015, the 69 FUAs lost residents, as they had a CAGR of −0.10%, and although the population of the periphery grew by 0.31%, that of urban cores decreased by −0.44%.



(2011–2015) **(2015–2019)**

Figure 1. Core and ring cumulative annual growth rates (CAGRs) for the 69 Spanish FUAs. Comparison between 2011–2015 (**left**) and 2015–2019 (**right**). Source: Padrón Continuo (Continuous Population Register), INE. Note: Sphere size represents metropolitan growth in absolute figures, reaching a maximum of 238,000 people (Madrid), during the second period analyzed. Blue spheres show that the whole FUA grew, whereas white ones indicate population decline.

Although there were multiple circumstances, the deurbanization stage was the most common in the Spanish FUAs during the economic crisis phase. By contrast, in the post-crisis period, suburbanization (with relative decentralization, as rings acquired more inhabitants than cores) was the predominant urban stae. As a whole (taking cores and peripheries together), the 69 FUAs had an annual growth of 0.44% between 2015 and 2019, as cores increased by 0.32% and peripheries grew by slightly more (0.59%). In the vast majority of cases (40 out of the 69 FUAs analyzed), population growth became positive in this period, and in 32 of them, both city cores and their peripheries grew. At the other end of the spectrum, 29 FUAs lost population, and in 15 of them, both urban core and ring populations decreased simultaneously. By contrast, 14 city cores lost inhabitants, whereas their peripheral municipalities did not. Finally, the opposite phenomenon occurred in the eight remaining cases. Therefore, the general picture is especially diverse, resulting in multiple timing and (positive and negative) population growth combinations in urban cores and peripheries. Algeciras, Almería, Girona, Lleida, Málaga, Marbella, Santiago de Compostela, Toledo, and Vitoria were the only nine FUAs in which the populations of both areas of the FUAs increased throughout the whole period analyzed. By contrast, in Ávila, Avilés, Cádiz, Córdoba, Cuenca, Ferrol, Gijón, Linares, Oviedo, and Ponferrada (10 FUAs), both city cores and suburban municipalities lost population throughout the entire timeframe under examination.

Figure 2 presents the same data shown in Figure 1 from a new perspective, with graphs now focusing on differences between cores and peripheries. The data show that, in 24 out of the 51 urban cores that lost population during the economic crisis phase, growth was positive in the second period. This means that most of them, namely, 27 cities, all situated in FUAs where growth was negative (white spheres), continued to lose population. In the opposite quadrant, blue spheres show where FUA growth was positive: Nearly all urban cores that gained population during the economic crisis phase (16 out of 18) continued to grow in the post-crisis period. Cartagena and Jerez, the only two exceptions, reversed their previous trend. As for peripheries, those that grew in the economic crisis phase continued to do so during the post-crisis period and, in fact, experienced much greater increases than urban cores. Those that decreased in the first period continued to do so, though at a slower pace than cores.

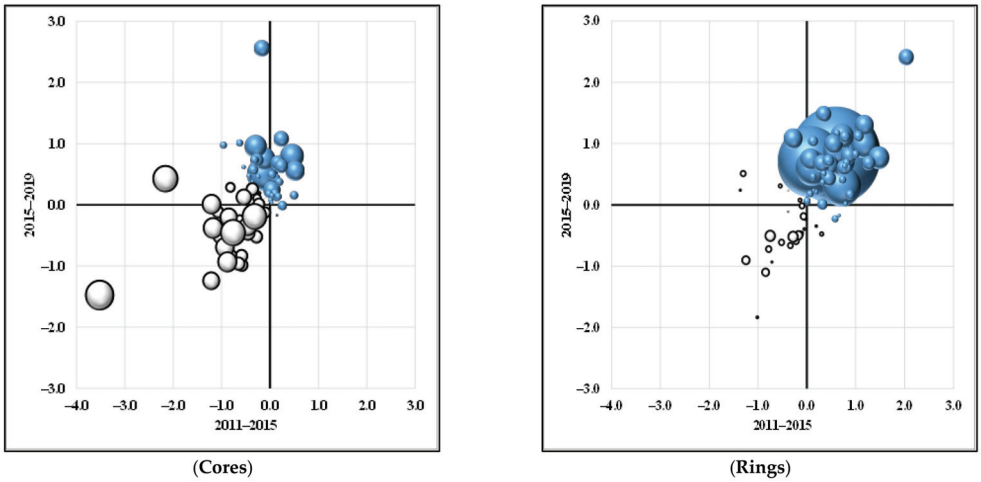


Figure 2. Cumulative annual growth rates (CAGRs) for the 69 Spanish FUAs in 2011–2015 and 2015–2019. Comparison between urban cores (**left**) and peripheral municipalities (**right**). Source: Padrón Continuo (Continuous Population Register), INE. Note: Sphere size represents metropolitan growth in absolute figures, reaching a maximum of 238,000 people (Madrid), during the second period analyzed. Blue spheres show that the whole FUA grew, whereas white ones indicate population decline.

4.1.2. Spanish FUA Classification: Many Diversifying Realities

In addition to core–periphery differences, Spanish urban areas can also be grouped according to their recent population changes.

(1) The first group—"shrinking cities"—contains the 26 areas that lost population in the two periods under study. Ávila, Cáceres, Gijón, Linares, Lugo, and Pontevedra peripheries lost more population than their urban cores in both periods. Similarly, Benidorm, Córdoba, and Oviedo peripheries lost more population than urban cores, but only during the most recent period under examination. However, in the rest of the FUAs (Alcoy, Avilés, Burgos, Cádiz, Cuenca, Ferrol, Jaén, León, Ourense, Palencia, Ponferrada, Salamanca, Santander, Talavera, Torrevieja, Valladolid, and Zamora), urban cores lost more population than their suburban municipalities.

(2) The second group—"dynamic cities"—is formed by 20 FUAs in which growth was positive throughout both periods under analysis. Albacete, Badajoz, Santiago, and Vitoria were the four most dynamic urban cores of this group, growing more than their rings in both phases. Algeciras, Irún, and Murcia also followed similar trends, though only in the last period. However, suburbanization predominated in the rest of this category's FUAs, namely, Almería, Ciudad Real, Donostia, Girona, Granada, Guadalajara, Huelva, Lleida, Málaga, Marbella, Pamplona, Seville, and Toledo. Seville stands out for being the only one of the five largest FUAs in Spain in this group.

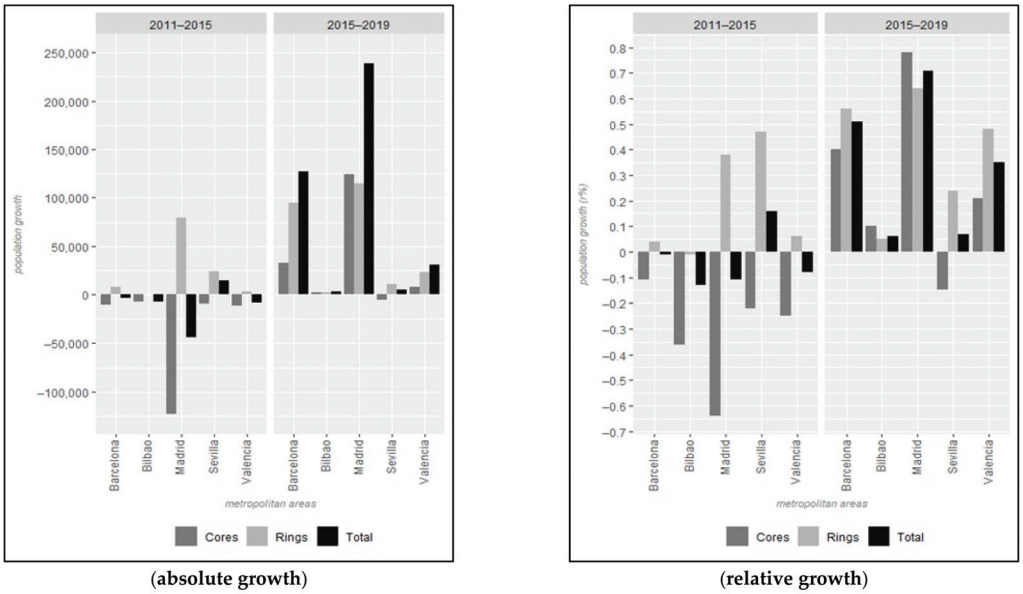
(3) This third group—"recovering cities"—also contains 20 FUAs that, despite losing population during the economic recession phase, regained it in the post-crisis period. The four largest Spanish FUAs (Barcelona, Bilbao, Madrid, and Valencia) belong to this group. Elche is the only urban area in which the city core grew more than its periphery in both periods analyzed. However, in Arrecife, Bilbao, Madrid, Manresa, Reus, Tarragona, and Vigo, this was only the case for the last period under examination. Suburbanization always predominated in the rest of this group's FUAs: A Coruña, Alicante, Barcelona, Castellón, Logroño, Lorca, Palma de Mallorca, Las Palmas de Gran Canaria, Sagunto, Santa Cruz de Tenerife, Valencia, and Zaragoza.

(4) The last group—"delayed cities"—has only three FUAs (Cartagena, Jerez, and Mérida), which gained population between 2011 and 2015 but lost inhabitants between 2015 and 2019. In Cartagena, peripheries were more dynamic than its core, whereas the opposite occurred in the other two FUAs (Jerez de la Frontera and Mérida) throughout both periods analyzed.

Hence, these results show that FUAs are now quite diverse, making it harder to establish general urban development guidelines. However, all of their growth figures are now much lower than those at the beginning of the 21st century.

4.2. The Post-Crisis Effects on the Five Largest Spanish FUAs: Growing Variability within Urban Areas

In this section, the paper analyzes how metropolitan dynamics have diversified inside FUAs by focusing on the five most populated ones in Spain. According to INE data, these are, in deceasing order, Madrid, Barcelona, Valencia, Seville, and Bilbao (Appendix A, Table A2). Concentrating first on differences between cores and peripheries (Figure 3), the five urban cores lost inhabitants during the economic crisis phase, notably so in Madrid. However, in the post-crisis phase, they began to recover their population figures once again. Seville is the only exception, as its population continued to decrease in the second period, though at a slower pace. Presently, Madrid is by far the most dynamic core, followed by Barcelona, Valencia, and Bilbao. More specifically, the cities of Madrid and Bilbao grew faster than their peripheries during the post-crisis phase, possibly indicating that they could be experiencing relative recentralization.



(**absolute growth**) (**relative growth**)

Figure 3. Core, ring, and the total FUA growth (for each of the five FUAs) in 2011–2015 and 2015–2019. Absolute numbers (**left graph**) and relative figures (**right graph**). Source: 2011, 2015, and 2019 Padrón Continuo (Continuous Population Register) microdata, INE.

The suburban municipalities of the five FUAs all grew in both periods, Bilbao being the only exception, as their numbers slightly dwindled between 2011 and 2015. In general, suburban growth was higher in the post-crisis phase than in the preceding period, with the exception of Seville, whose periphery grew more during the economic crisis period. Therefore, these reducing suburbanization trends could indicate that the Seville FUA was recentralizing (in relative, not absolute, terms).

Finally, as shown by the maps in Figure 4, the post-crisis economic recovery gave rise to a new metropolitan population growth phase, ending previous trends. During the economic crisis phase (2011–2015), the five FUAs analyzed were characterized by negative international migration and low suburbanization. Therefore, peripheries gained less population than in previous decades. Urban cores decreased due to both negative natural and migratory growth, though they stopped losing as much population to peripheries due to the growing attractiveness of cores.

Having shown a certain capacity to retain population during the economic crisis phase, cores became attractive to international migration once again between 2015 and 2019, compensating for the reactivation of suburbanization flows. In fact, some migratory flows, such as those to large cities, were never interrupted. Consequently, during the post-crisis phase, growth became positive in the four cores. As previously explained, Seville is the only exception because it attracted less international immigration. Changes in the city of Madrid are particularly outstanding, as after experiencing the highest population decrease of all five cores between 2011 and 2015, it had the strongest increase in the following period.

In Madrid, Barcelona, and Valencia FUAs, suburban peripheries grew once again. However, those of Bilbao did not undergo many changes, as some municipalities that lost inhabitants in the crisis period were now gaining it (and vice versa). In fact, the population figures of the Bilbao FUA as a whole (core plus rings) remained quite stable. By contrast, the suburban municipalities of the Seville FUA generally grew to a lesser extent or even decreased in the second period, with western peripheries being the only exception.

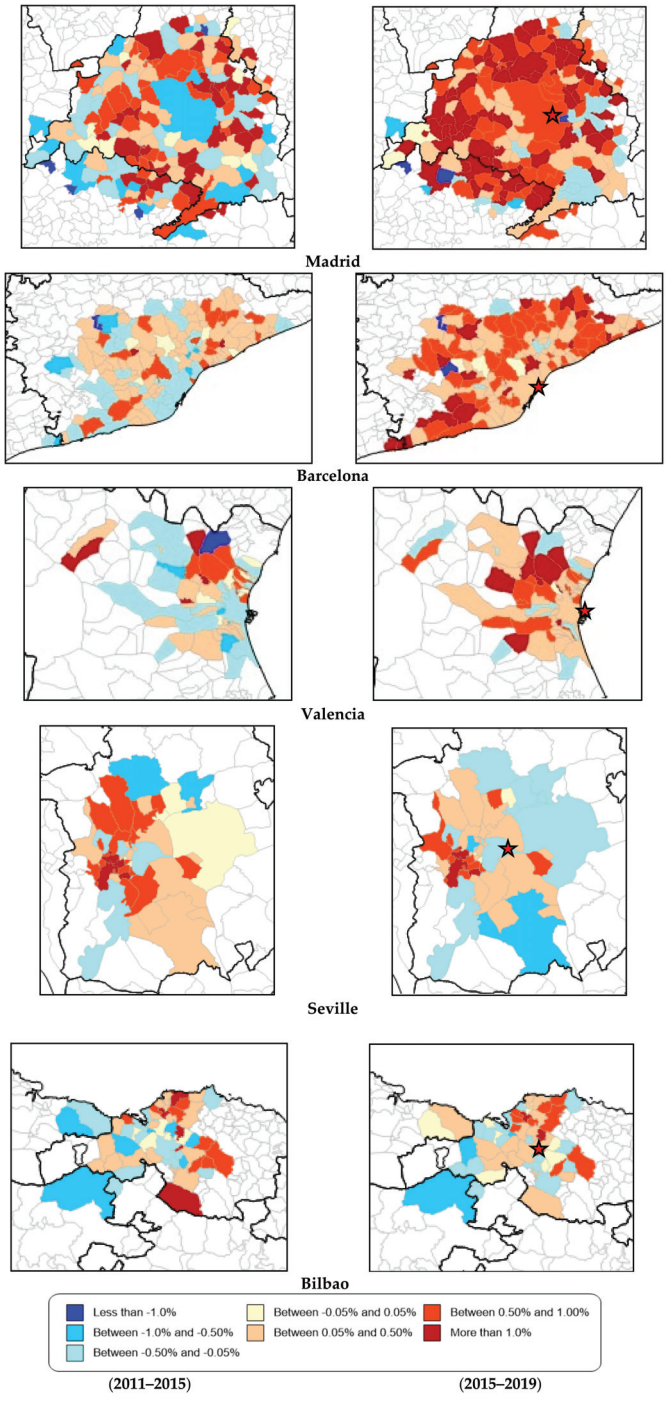


Figure 4. CAGRs by municipality (for each of the five FUAs) in 2011–2015 (**left**) compared to 2015–2019 (**right**). Source: 2011, 2015, and 2019 Padrón Continuo (Continuous Population Register) microdata, INE.

The peripheries of Madrid, Barcelona, and Valencia FUAs show novelties that demonstrate that post-crisis population growth was not just a replication of the economic expansion phase prior to the Great Recession. In addition to the economic crisis and its effects, the generations moving out of their parents' home at this time were also smaller than those leaving them at the beginning of the 21st century: These were the Spanish baby boomers, the largest cohorts ever born in the country. Therefore, peripheries did not grow as much as they did then. Moreover, all three metropolitan areas contain locations, generally situated at metropolitan fringes, that continued to lose population during the post-crisis phase, as they did in the previous economic crisis era. These are typically small municipalities that incorporated late to suburbanization flows during the economic expansion phase and, being located far from urban cores, were not very attractive to residential movers. The housing market of these metropolitan fringes is far from being as attractive as it was during the housing bubble.

These results refer to the total population growth or decrease in cores, rings, and whole FUAs. However, there are significant differences in the spatial patterns of population growth and mobility according to age, nationality, marital status, and type of household, as explained in the theoretical framework. This has been investigated in other publications by the authors [22,49,74]. For example, although young families continue to suburbanize, some recentralization is observed among those around 50 years of age, and even more so among the youth (20–29 years). In contrast, those over 80 years of age continue to show a trend towards suburbanization: they leave the city to live with their descendants or in residential homes for the elderly in the periphery [95]. These dynamics are shown more clearly in Barcelona and Madrid and are less distinct in the other three cities [5].

5. Discussion

The research results confirm the article's hypothesis: During the post-crisis economic recovery period, the spatial distribution of the population in Spanish urban areas was reshaped. Population growth patterns were more diverse than they were during the economic crisis years. Indeed, when calculating population growth rates for city cores and peripheries and for each of the urban areas as a whole, significant differences appear not only among them but also within them. Cores and peripheries show different behaviors in diverse urban areas, ring municipalities differ from one another, and metropolises vary among each other. Regarding this last point, the results show that from 2011 to 2015, most of the 69 examined FUAs lost population, whereas from 2015 to 2019, population growth was positive in most of them. Although both phases showed an enormous variety of situations in which urban cores and peripheries gained and lost population, it can be concluded that this heterogeneity increased in the second period under analysis. For example, some of the urban areas that always either gained or lost population experienced new realities, such as their cores growing more than their peripheries. Large cities such as Madrid and Bilbao, for instance, increased more than their rings. The post-crisis reactivation of foreign immigration (in 2018, there were 760,804 entries from abroad, very similar to the highest figures registered in first decade of the 21st century) could be behind this renewed attractiveness of core cities.

As previously mentioned, there seem to be no obvious geographical patterns. Perhaps the FUAs that have continuously lost population since 2011 show the clearest one. These are mostly either inland provincial capitals or cities located in declining industrial areas. Burgos, Cuenca, Jaén, León, Ourense, Palencia, Salamanca, Valladolid, and Zamora are the first type, and Alcoy, Avilés, Cádiz, Ferrol, Ponferrada, and Talavera are the second. Both groups of cities share a low capacity to attract international immigration. At the other end of the spectrum, FUAs that gained population throughout both analyzed phases seem to have a greater diversity of features: They are predominantly located on the coast or near a large Spanish metropolitan area and mainly have a diversified or an industrially based economy. This is the case for Almería, Ciudad Real, Donostia, Girona, Granada, Guadalajara, Huelva, Lleida, Málaga, Marbella, Murcia, Pamplona, Seville, and Toledo.

This increasing variety of situations (or heterogeneity of population dynamics) among urban areas is also verifiable within the five large metropolises analyzed, which addresses the second objective of the article. In other words, both city cores and ring municipalities show examples of population growth and decline. Although suburbanization was reactivated in the post-crisis period, urban core attractiveness increased during those years, as, except for Seville, their population grew. Many peripheral municipalities also experienced accelerated population growth during post-crisis years, although some of them (still) lost inhabitants. These uneven population dynamics act similarly to what, we suppose, occurs inside large cities among neighborhoods. Therefore, further analysis focusing on census tracts and additional research on migratory flows, as well as natural growth, will provide answers to new questions raised by the present study. Nevertheless, what this paper does show is that the stages defined by the urban development model are no longer useful for analyzing and interpreting present urban dynamics in Spanish FUAs.

In any case, urban core and periphery growth between 2015 and 2019 seems to have been intimately related to international migration and internal residential mobility increases in an improving economic context. Indeed, in Spain, the economic crisis was extremely intense, and residential insecurity rose more than in other European countries, as vulnerable groups were overrepresented [96]. The recession entailed an interruption of international immigration entries and a modification of internal flows, though these did not decrease as much as expected in metropolitan areas. Furthermore, after the real estate bubble burst, there was a reduction in the vast suburbanization flows that characterized previous decades [11,97,98] not only in large urban areas but also in intermediate-size ones [15]. This decrease in decentralization was even interpreted by some authors as evidence of an emerging urban population recentralization process [6,99]. However, as residential mobility patterns vary with economic cycles, these rates started to grow in 2015, reflecting diversification of socio-residential strategies and the transformation of interactions between intra-metropolitan spaces [20,100]. This recent enhancement in residential mobility and its increasingly complex patterns of origin, destination, age, socioeconomic category, and life stage, among others, has had pronounced demographic and socioeconomic impacts. Moreover, it has had spatial effects on urban areas, as many suburban municipalities grew again at the same time as their cores.

Though it is difficult to establish cause–effect relationships with this largely descriptive research, Spain's rising residential mobility during the post-crisis period runs parallel to several socioeconomic processes mentioned in the theoretical framework chapter: housing and labor market modifications, family and household transformations, and spatial socio-residential pattern changes. In our view, all of these processes would lead to growing and more diverse residential mobility.

Housing market transformations, for instance, would have intensified multiple flows between (and within) cores and rings through diverse mechanisms, such as gentrification, touristification, and in general, problems faced by young people and immigrants in affording a dwelling. On the other hand, the labor market also recovered between 2014 and early 2020, creating thousands of jobs that, once again, attracted foreign immigrants and reactivated internal and intra-metropolitan flows. Population and household transformations, which are together known as the Second Demographic Transition, are apparently less related to economic circumstances. Single and divorced people seem to prefer living in central areas, whereas family households tend to live in peripheral regions during both expansive and recessive economic phases. However, the post-crisis era may have accelerated life cycle transitions: For example, having a child or divorcing is expensive, and in consequence, so is residential mobility. Therefore, during recent recovery years, all of these family transformations would have also had an impact on urban demographic and spatial structures.

Finally, was the suburbanization of poverty occurring in the post-crisis period? Maintaining that poverty was expelled to the peripheries of Spanish cities can be considered an oversimplification. However, a global review of recent theoretical and empirical con-

tributions shows that residential mobility does play an essential but extremely complex role in the social reconfiguration of metropolitan spatial interactions [87]. In the absence of more detailed studies, we believe that rather than a simplistic dichotomy between affluent cores and poor rings, residential mobility generates new "fragmented" spaces in a similar sense to that applied by Borsdorf and Hidalgo for Latin American urban areas [101], although with significant differences. Indeed, Latin American cities had a historical urban structure characterized by affluent people living in city cores and poor residents inhabiting peripheries [102]. As gated condominiums for the middle and upper classes have been built in peripheries, these privileged social groups are partly suburbanizing in those countries [103]. However, the situation is different in Europe and the U.S., where, as previously noted, middle to high classes are moving downtown. Nevertheless, from a spatial socio-demographic point of view, the results obtained are similar: Both cores and peripheries are increasingly complex, with affluent, middle-class, and deprived groups, as well as aged and rejuvenated populations, living in adjacent neighborhoods (within the same city) or nearby residential developments (within the same suburban municipalities). As city cores and rings are progressively more mixed and diversified, we can maintain that urban areas are increasingly demographically complex, diversified, or "fragmented." This paper's results for Spanish urban areas during recovery years are in line with this urban tendency.

Of course, these research results reflect a post-crisis reality that was abruptly interrupted by the COVID-19 pandemic and the state of alarm in mid-March 2020 (Royal Decree 463/2020, issued on 14 March 2020). Mandatory confinement decreed by the government to stop the spread of the virus had a deep economic and social impact that will modify, at least in the short and medium term, the described urban population dynamics. The closure of Spain's and other countries' borders, breaking global circulation, has also had a great impact on the main component of metropolitan population growth: migration. This prevents new entries while fixing the population to the territory. Therefore, we are facing a new phase, and its uncertain future developments, depending on how the pandemic continues to unfold, will require new research.

Author Contributions: Conceptualization, F.G.-A., C.L.-V., J.B.-i.-C., and I.P.; data curation, J.B.-i.-C.; formal analysis, F.G.-A. and J.B.-i.-C.; funding acquisition, C.L.-V. and F.G.-A.; investigation, F.G.-A., C.L.-V., J.B.-i.-C., and I.P.; methodology, F.G.-A., J.B.-i.-C., and I.P.; project administration, C.L.-V.; supervision, F.G.-A. and I.P.; writing—original draft, F.G.-A. All authors have read and agreed to the published version of the manuscript.

Funding: Research for the present paper was conducted within the following I + D + i project: Nuevas movilidades y reconfiguración sociorresidencial en la poscrisis: consecuencias socioeconómicas y demográficas en las áreas urbanas españolas (New mobilities and socio-residential reconfiguration in the post-crisis: socio-economic and demographic consequences in Spanish urban areas, ref. RTI2018-095667-B-I00), directed by Cristina López Villanueva and Fernando Gil Alonso. It was funded by the Ministry of Science and Innovation, the Spanish Research Agency, and the European Regional Development Fund (AEI/ERDF, EU). Some of the authors are members of the Territori, Població i Ciutadania (Territory, Population, and Citizenship) consolidated research group, recognized by the Catalan government (ref. GRC_2017SGR1298) and coordinated by Fernando Gil Alonso.

Data Availability Statement: Publicly available datasets were analyzed in this study. This data can be found here: https://www.ine.es/.

Acknowledgments: A very preliminary version of this research was presented at the XV Coloquio de Geografía Urbana (2020). The authors are grateful for the comments received from the organizers and participants, but also from the *Urban Science* editorial team and the three reviewers, all of them contributing to improvements in the text.

Conflicts of Interest: The authors declare no conflict of interest.

Appendix A

Table A1. Core and ring CAGRs for the analyzed FUAs in Spain in 2011–2015 and 2015–2019.

	2011–2015			2015–2019		
	Core	**Rings**	**Total**	**Core**	**Rings**	**Total**
A Coruña	−0.22	0.28	−0.02	0.19	0.67	0.39
Albacete	0.11	−0.04	0.09	0.17	−0.40	0.12
Alcoy	−0.63	−0.39	−0.59	−0.24	0.23	−0.16
Algeciras	0.23	0.34	0.25	0.63	0.51	0.61
Alicante	−0.43	0.54	−0.16	0.47	0.99	0.62
Almería	0.50	1.06	0.58	0.55	1.12	0.63
Arrecife	−0.18	0.12	−0.04	2.56	1.04	1.85
Ávila	−0.28	−0.72	−0.30	−0.26	−0.93	−0.30
Avilés	−0.83	−0.22	−0.62	−0.84	−0.59	−0.76
Badajoz	0.14	−0.11	0.10	0.13	−0.47	0.03
Barcelona	−0.17	0.05	−0.02	0.50	0.71	0.64
Benidorm	−1.06	0.57	−0.17	−0.12	−0.23	−0.18
Bilbao	−0.54	−0.01	−0.19	0.12	0.06	0.08
Burgos	−0.30	0.80	−0.17	−0.18	0.69	−0.08
Cáceres	0.16	−0.84	−0.04	0.13	−1.10	−0.10
Cádiz	−0.90	−0.06	−0.46	−0.93	−0.19	−0.53
Cartagena	0.16	0.98	0.23	−0.17	0.82	−0.09
Castellón de la Plana	−1.19	−0.53	−1.02	0.01	0.31	0.09
Ciudad Real	−0.12	0.72	0.11	0.11	0.41	0.19
Córdoba	−0.10	−0.02	−0.09	−0.13	−0.23	−0.14
Cuenca	−0.57	−0.38	−0.55	−0.33	−0.11	−0.32
Donostia	−0.01	0.42	0.18	0.18	0.43	0.29
Elche	−0.33	−1.31	−0.45	0.57	0.51	0.56
Ferrol	−1.23	−0.16	−0.65	−1.24	−0.50	−0.84
Gijón	−0.30	−0.52	−0.31	−0.23	−0.61	−0.26
Girona	0.22	0.34	0.27	1.08	1.48	1.25
Granada	−0.45	0.67	0.19	−0.36	0.71	0.27
Guadalajara	−0.32	2.03	0.30	0.74	2.41	1.20
Huelva	−0.44	0.87	0.02	−0.46	0.80	0.00
Irún	0.19	0.67	0.30	0.37	−0.17	0.25
Jaén	−0.30	0.20	−0.16	−0.52	−0.35	−0.47
Jerez de la Frontera	0.24	0.11	0.23	−0.01	−0.16	−0.02
León	−0.94	0.30	−0.45	−0.69	−0.48	−0.61
Linares	−0.57	−1.01	−0.59	−0.99	−1.84	−1.02
Lleida	0.02	0.88	0.24	0.07	0.17	0.10
Logroño	−0.21	0.77	−0.01	−0.03	1.11	0.21
Lorca	−0.31	0.61	−0.19	0.73	1.17	0.79
Lugo	0.03	−1.23	−0.21	0.04	−0.91	−0.14
Madrid	−0.96	0.58	−0.16	0.97	0.81	0.89
Málaga	0.05	0.58	0.23	0.24	0.87	0.45
Manresa	−0.64	0.13	−0.33	1.01	0.46	0.79
Marbella	0.16	0.72	0.47	0.68	1.12	0.92
Mérida	0.50	−0.34	0.24	0.15	−0.66	−0.10
Murcia	−0.13	0.44	0.03	0.75	0.65	0.72
Ourense	−0.41	0.16	−0.25	−0.24	0.21	−0.11
Oviedo	−0.39	−0.30	−0.37	−0.25	−0.52	−0.33
Palencia	−0.61	0.83	−0.35	−0.37	0.60	−0.19
Palma de Mallorca	−0.29	−0.30	−0.29	0.95	1.08	1.00
Las Palmas de GC	−0.23	−0.13	−0.19	0.01	0.07	0.04
Pamplona	−0.26	1.17	0.41	0.73	0.98	0.85
Ponferrada	−0.60	−0.77	−0.64	−0.84	−0.72	−0.81
Pontevedra	0.04	−0.76	−0.30	0.15	−0.51	−0.12
Reus	−0.83	0.80	−0.63	0.28	0.01	0.25
Sagunto	−0.25	0.76	−0.07	0.46	0.63	0.49

Table A1. *Cont.*

	2011–2015			2015–2019		
	Core	**Rings**	**Total**	**Core**	**Rings**	**Total**
Salamanca	−1.17	1.28	−0.52	−0.38	0.68	−0.08
Santa Cruz de Tenerife	−2.14	0.07	−0.86	0.43	0.74	0.62
Santander	−0.84	0.30	−0.23	−0.20	0.01	−0.09
Santiago de Comp.	0.11	0.07	0.09	0.43	0.18	0.30
Seville	−0.33	0.71	0.24	−0.19	0.31	0.08
Talavera	−1.01	0.13	−0.82	−0.51	0.24	−0.39
Tarragona	−0.53	0.75	−0.04	0.62	0.60	0.61
Toledo	0.04	0.44	0.21	0.49	0.72	0.59
Torrevieja	−3.53	−1.36	−3.43	−1.48	0.24	−1.38
Valencia	−0.37	0.09	−0.12	0.26	0.60	0.44
Valladolid	−0.77	1.47	−0.16	−0.45	0.77	−0.10
Vigo	−0.27	−0.09	−0.19	0.11	−0.02	0.05
Vitoria	0.45	0.32	0.44	0.80	0.37	0.75
Zamora	−0.65	0.60	−0.53	−0.96	−0.22	−0.89
Zaragoza	−0.36	1.16	−0.19	0.38	1.30	0.49
All FUAs	**−0.44**	**0.31**	**−0.10**	**0.32**	**0.59**	**0.44**

Source: 2011–2019 Padrón Continuo (Continuous Population Register), INE.

Table A2. Absolute population change and CAGRs for the 5 largest FUAs (cores and rings) in Spain in 2011–2015 and 2015–2019.

	Population			CAGR	
	2011	**2015**	**2019**	**2011–2015**	**2015–2019**
CORES					
Madrid	3,265,038	3,141,991	3,266,126	−0.96	0.97
Barcelona	1,615,448	1,604,555	1,636,762	−0.17	0.50
Valencia	798,033	786,189	794,288	−0.37	0.26
Seville	703,021	693,878	688,592	−0.33	−0.19
Bilbao	352,700	345,141	346,843	−0.54	0.12
RINGS					
Madrid	3,422,538	3,502,003	3,616,335	0.58	0.81
Barcelona	3,302,071	3,309,310	3,403,820	0.05	0.71
Valencia	928,053	931,284	953,854	0.09	0.60
Seville	824,554	848,284	858,709	0.71	0.31
Bilbao	694,167	693,857	695,495	−0.01	0.06

Source: 2011–2019 Padrón Continuo (Continuous Population Register), INE.

References

1. Piketty, T. *Capital in the 21st Century*; Harvard University Press: Cambridge, MA, USA, 2014.
2. Méndez, R. *La Telaraña Financiera: Una Geografía de la Financiarización y su Crisis*; RiL Editores: Barcelona, Spain, 2018.
3. Domingo, A.; Blanes, A. Inmigración y emigración en España: Estado de la cuestión y perspectivas de futuro. In *Anuario de la Inmigración en España 2014*; Arango, J., Malapeira, D.M., Alonso, J.O., Eds.; CIDOB: Barcelona, Spain, 2015; pp. 94–122.
4. Bayona, J.; Gil-Alonso, F.; Pujadas, I.; Rubiales, M. New Spatial Mobility Patterns in Large Spanish Cities: From the Economic Boom to the Great Recession. *Appl. Spat. Anal. Policy* **2018**, *11*, 287–312. [CrossRef]
5. Bayona, J.; Pujadas, I. Las grandes áreas metropolitanas en España: Del crecimiento y la expansión residencial al estancamiento poblacional. *Doc. d'Anàlisi Geogràfica* **2020**, *66*, 27–55. [CrossRef]
6. López-Gay, A. Population growth and re-urbanisation in Spanish inner cities: The role of internal migration and residential mobility. *Rev. Quetelet* **2014**, *2*, 67–92. [CrossRef]
7. López-Gay, A. Hacia un patrón territorial complejo de la movilidad residencial: El caso de la Región Metropolitana de Barcelona. *Pap. Rev. Sociol.* **2017**, *104*, 793–823. [CrossRef]
8. Feria-Toribio, J.M.; Andújar Llosa, A. Movilidad residencial metropolitana y crisis inmobiliaria. *An. Geogr.* **2015**, *35*, 13–40. [CrossRef]

9. Gil-Alonso, F.; Bayona, J.; Pujadas, I. From boom to crash: Spanish urban areas in a decade of changes (2001–2011). *Eur. Urban Reg. Stud.* **2016**, *23*, 198–216. [CrossRef]
10. Palomares-Lin, I.; Feria-Toribio, J.M.; Susino-Arbucias, J. Medida y evolución de la movilidad residencial en las áreas metropolitanas españolas. *Pap. Rev. Sociol.* **2017**, *102*, 545–574.
11. Pujadas, I. Movilidad residencial y expansión urbana en la Región Metropolitana de Barcelona, 1982–2005. *Scr. Nova Rev. Electrónica de Geogr. y Cienc. Soc.* **2009**, *13*, 290.
12. Pozo, E.; Rodríguez Moya, J.M. Impacto de la crisis en los movimientos migratorios en la comunidad de Madrid (2007–2013). *Boletín Asoc. Geógrafos Españoles* **2018**, *77*, 229–255. [CrossRef]
13. Bayona, J.; Gil-Alonso, F. Suburbanisation and international immigration: The case of the Barcelona Metropolitan Region (1998–2009). *Tijdschr. Econ. Soc. Geogr.* **2012**, *103*, 312–329. [CrossRef]
14. Bayona, J.; Pujadas, I. Movilidad residencial y redistribución de la población metropolitana: Los casos de Madrid y Barcelona. *EURE* **2014**, *40*, 261–287.
15. Garcia-Coll, A.; López-Villanueva, C.; Pujadas, I. Movilidad residencial en tiempos de crisis. El caso de la Región Metropolitana de Barcelona. *Scr. Nova Rev. Electrónica Geogr. Cienc. Soc.* **2016**, *20*, 549.
16. López-Villanueva, C.; García, A.; Bretones, M.T.; Crespi, M. Los efectos de la crisis económica en el urbanismo disperso de la Región Metropolitana de Barcelona. *Clivatge* **2017**, *5*, 291–331.
17. Andújar-Llosa, A. Movilidad residencial y (re)composición social del espacio urbano en el municipio de Madrid. *Pap. Sociol.* **2017**, *102*, 761–792.
18. Myro, R. Crecimiento económico con equilibrio exterior. Un Nuevo Escenario para la economía española. *Eur. Policy Brief* **2018**, *13*, 1–16. Available online: https://www.europeg.com/images/phocadownload/policybrief13/EuropeG_-_Policy_Brief_n13_ES.compressed.pdf (accessed on 7 May 2021).
19. Alves, P.; Urtasun, A. Evolución reciente del mercado de la vivienda en España. *Boletín Económico Banco España* **2019**, *2*, 1–11. Available online: https://euroval.com/wp-content/uploads/2019/04/BdE-Evolucion-reciente-del-mercado-vivienda.pdf (accessed on 7 May 2021).
20. Garcia-Coll, A.; López-Villanueva, C. The impact of economic crisis in areas of sprawl in Spanish cities. *Urban Sci.* **2018**, *2*, 113. [CrossRef]
21. Otero, R.; García-Abad, J.; Domínguez, J.; Pérez-Caramés, A. Inmigración y dinámicas territoriales en España: Crisis y recuperación (2008–2017). In *Anuario CIDOB de la Inmigración 2019*; Arango, J., Moya, D., Sánchez-Montijano, E., Eds.; CIDOB: Barcelona, Spain, 2019; pp. 190–217.
22. Gil-Alonso, F.; Thiers, J. Population and economic cycles in the main Spanish urban areas: The migratory component. *Comp. Popul. Stud.* **2019**, *44*, 317–350.
23. Hall, P. Spatial structure of metropolitan England and Wales. In *Spatial Policy Problems of the British Economy*; Chisholm, M., Manners, G., Eds.; Cambridge University Press: Cambridge, UK, 1971; pp. 96–125.
24. Klaasen, L.H.; Molle, W.; Paelink, J.H. Dynamics of urban development. In Proceedings of the International Conference Held on the Occasion of the 50th Anniversary, Rotterdam, The Netherlands, 4 September 1979; Gower: Aldesrshot, UK, 1981.
25. Berg, L.V.D.; Drewett, R.; Klaassen, L.H.; Rossi, A.; Vijverberg, C.H. *A Study of Growth and Decline*; Pegasus: Oxford, UK, 1982.
26. Champion, A.G. Urbanisation, urbanisationSuburbanisation, Counterurbanisation and Reurbanisation. In *Handbook of Urban Studies*; Paddison, R., Ed.; SAGE: London, UK, 2001; pp. 143–161.
27. Fielding, A.J. Counterurbanisation in Western Europe. *Prog. Plan.* **1982**, *17*, 1–52. [CrossRef]
28. Geyer, H.S.; Kontuly, T.M. A theoretical foundation for the concept of differential urbanisation. *Int. Reg. Sci. Rev.* **1993**, *15*, 157–177. [CrossRef]
29. Wolff, M. Understanding the role of centralization processes for cities—Evidence from a spatial perspective of urban Europe 1990–2010. *Cities* **2018**, *75*, 20–29. [CrossRef]
30. Rérat, P. The new demographic growth of cities: The case of reurbanisation in Switzerland. *Urban Stud.* **2012**, *49*, 1107–1125. [CrossRef]
31. Kabisch, N.; Haase, D. Diversifying European Agglomerations: Evidence of Urban Population Trends for the 21st Century. *Popul. Space Place* **2011**, *17*, 236–253. [CrossRef]
32. Wolff, M.; Wiechmann, T. Urban growth and decline: Europe's shrinking cities in a comparative perspective 1990–2010. *Eur. Urban Reg. Stud.* **2018**, *25*, 122–139. [CrossRef]
33. Bagchi-Sen, S.; Franklin, R.S.; Rogerson, P.; Seymour, E. Urban inequality and the demographic transformation of shrinking cities: The role of the foreign born. *Appl. Geogr.* **2020**, *116*, 1–13. [CrossRef]
34. Gil-Alonso, F.; Bayona-i-Carrasco, J.; López-Villanueva, C.; Pujadas-Rúbies, I. Diferencias geográficas de la fecundidad en España: Una perspectiva provincial. *Pap. Geogr.* **2017**, *63*, 21–38. [CrossRef]
35. Rodrigo-Comino, J.; Egidi, G.; Sateriano, A.; Poponi, S.; Mosconi, E.M.; Gimenez Morera, A. Suburban Fertility and Metropolitan Cycles: Insights from European Cities. *Sustainability* **2021**, *13*, 2181. [CrossRef]
36. Clark, W.A.V. Residential mobility in context: Interpreting behavior in the housing market. *Pap. Sociol.* **2017**, *102*, 575–605. [CrossRef]
37. Méndez Gutiérrez del Valle, R. De la hipoteca al desahucio: Ejecuciones hipotecarias y vulnerabilidad territorial en España. *Rev. Geogr. Norte Gd.* **2017**, *67*, 9–31. [CrossRef]

38. Leal, J.; Martínez del Olmo, A. El progresivo abandono de la política de vivienda en España. *Cuad. Relac. Labor.* **2017**, *35*, 15–41. [CrossRef]
39. Sorando, D.; Uceda, P. Fragmentos urbanos después de la burbuja inmobiliaria: El caso de Madrid. *OBETS. Rev. Cienc. Soc.* **2018**, *13*, 383–410. [CrossRef]
40. Módenes, J.A.; Fernández, C.; López, J. La formación de hogares y la tenencia de viviendas de los jóvenes en la reconfiguración de los sistemas residenciales europeos. *Scripta Nova Rev. Electrónica Geogr. Cienc. Soc.* **2013**, *XVII*, 460.
41. Pareja-Eastaway, M.; Sánchez-Martínez, T. More social housing? A critical analysis of social housing provision in Spain. *Crit. Hous. Anal.* **2017**, *4*, 124–131. [CrossRef]
42. Ozlem, A.; García-Montalvo, J.; García-Villar, J.; Peydró, J.L.; Raya, J.M. The real state and credit bubble: Evidence from Spain. *J. Span. Econ. Assoc.* **2014**, *5*, 223–243.
43. López Rodríguez, D.; Matea-Rosa, M.L. Evolución reciente del mercado del alquiler de vivienda en España. *Boletín Económico* **2019**, *3*, 1–18. Available online: https://dialnet.unirioja.es/servlet/articulo?codigo=7128894 (accessed on 7 May 2021).
44. Donat, C. La gentrificació i el problema de l'habitatge a Barcelona. *Pap. Regió Metrop. Barc.* **2018**, *60*, 114–129.
45. Colomb, C.; Novy, J. *Protest and Resistance in the Tourist City*; Routledge: London, UK, 2016.
46. Cócola-Gant, A. Holiday rentals: The new gentrification battlefront. *Sociol. Res. Online* **2016**, *21*, 112–120. [CrossRef]
47. López-Gay, A.; Cócola-Gant, A. Transnational gentrification, tourism and the formation of 'foreign only' enclaves in Barcelona. *Urban Stud.* **2020**, *57*, 3025–3043.
48. Domínguez Pérez, M.; Crespi-Vallbona, M. ¿Es posible la sostenibilidad de las ciudades turistificadas? Los casos de los centros históricos de Madrid y Barcelona. *Rotur Rev. ocio Tur.* **2021**, *15*, 22–38. [CrossRef]
49. Thiers, J.; Gil-Alonso, F. Dinámicas residenciales de la inmigración latinoamericana en las metrópolis de Barcelona y Madrid: Cambios de tendencias durante la expansión, la crisis y la poscrisis. *Doc. d'Anàlisi Geogràfica* **2020**, *66*, 57–82. [CrossRef]
50. Bőhning, W.R. *The Migration of Workers in the United Kingdom and the European Community*; Oxford University Press: London, UK, 1972.
51. Bőhning, W.R.; Maillat, D. *The Effects of the Employment of Foreign Workers*; Organisation for Economic Co-operation and Development: Paris, France, 1974.
52. Dobson, J.; Latham, A.; Salt, J. On the move? Labour migration in times of recession. *Policy Network Paper* **2009**, 1–23. Available online: https://www.geog.ucl.ac.uk/research/research-centres/migration-research-unit/publications/mru-publications/pdfs/on_the_move.pdf (accessed on 7 May 2021).
53. Fielding, T. *Migration in a Time of Crisis: A Simple Conceptual Framework Applied to East Asian Migrations*; Centre for Migration Research Working Paper 63; University of Sussex: Sussex, UK, 2010.
54. King, R.; Fielding, A.; Black, R. The international migration turnaround in southern Europe. In *Southern Europe and the New Immigrations*; King, R., Black, R., Eds.; Sussex Academic Press: Brighton, UK, 1997; pp. 1–25.
55. Piore, M. *Birds of Passage: Migrant Labor and Industrial Societies*; Century University Press: New York, NY, USA, 1979.
56. *Eldorado or Fortress? Migration in Southern Europe*; King, R.; Lazaridis, G.; Tsardanidis, C. (Eds.) Palgrave Macmillan: New York, NY, USA, 2000.
57. Domingo, A.; Gil-Alonso, F. Immigration and Changing Labour Force Structure in the Southern European Union. *Population* **2007**, *62*, 709–727. [CrossRef]
58. Aysa-Lastra, M.; Cachón, L. Introduction: Vulnerability and Resilience of Latin American during the Great Recession. In *Immigrant Vulnerability and Resilience. Comparative Perspectives on Latin American Immigrants during the Great Recession*; Aysa-Lastra, M., Cachón, L., Eds.; Springer: New York, NY, USA, 2015; pp. 1–21.
59. Gil-Alonso, F.; Vidal-Coso, E. Inmigrantes extranjeros en el mercado de trabajo español: ¿más resilientes o más vulnerables al impacto de la crisis? *Migraciones* **2015**, *37*, 97–123. [CrossRef]
60. Bayona-i-Carrasco, J.; Thiers-Quintana, J.; Ávila-Tàpies, R. Economic recession and the reverse of internal migration flows of Latin American immigrants in Spain. *J. Ethic Migr. Stud.* **2017**, *43*, 2499–2518. [CrossRef]
61. Prieto, V.; Recaño, J.; Quintero-Lesmes, D. Migration responses of immigrants in Spain during the Great Recession. *Demogr. Res.* **2018**, *38*, 1885–1932. [CrossRef]
62. Gil-Alonso, F.; Bayona-i-Carrasco, J.; Pujadas, I. Las migraciones internas de los extranjeros en España. Dinámicas espaciales recientes bajo el impacto de la crisis. *Boletín Asoc. Geógrafos Españoles* **2015**, *69*, 233–261. [CrossRef]
63. Clark, W. Life Events and Moves Under Duress: Disruption in the Life Course and Mobility Outcomes. *Longitud. Life Course Stud.* **2016**, *7*, 218–239. [CrossRef]
64. Tyrrell, N.; Kraftl, P. Lifecourse and internal migration. In *Internal Migration. Geographical Perspectives and Processes*; Smith, D.P., Finney, N., Walford, N., Eds.; Routledge: London, UK, 2015; pp. 15–30.
65. Lesthaeghe, R.; Van de Kaa, D.J. Two demographic transitions. *Popul. Growth Decline* **1986**, *1*, 9–24.
66. Feijten, P.; van Ham, M. Residential mobility and migration of the divorced and separated. *Demogr. Res.* **2007**, *17*, 623–654. [CrossRef]
67. Jamieson, L.; Simpson, R. *Living Alone: Globalization, Identity and Belonging*; Palgrave Macmillan: Basingstoke, UK, 2014; pp. 23–32.
68. Frey, W.; Kobrin, F. Changing families and changing mobility: Their impact on the central city. *Demography* **1982**, *19*, 261–277. [CrossRef] [PubMed]

69. Buzar, S.; Odgen, P.E.; Hall, R. Households matter: The quiet demography of urban transformation. *Prog. Hum. Geogr.* **2005**, *29*, 413–436. [CrossRef]
70. Bonvalet, C.; Lelièvre, E. Du concept de ménage a celui ci d'entourage: Une redefinition de l'espace familial. In *De la Famille à l'entourage: L'enquête Biographies et Entourage*; INED: Paris, France, 2012; pp. 51–66.
71. Champion, T.; Shuttleworth, I. Are people changing address less? An analysis of migration within England and Wales, 1971–2011, by distance of move. *Popul. Space Place* **2017**, *23*, 2026. [CrossRef]
72. Bell, M.; Wilson, T.; Charles-Edwards, E.; Ueffing, P. The long-run decline in internal migration intensities. In *Internal Migration in the Developed World: Are We Becoming Less Mobile?* Champion, T., Cooke, T., Shuttleworth, I., Eds.; Routledge: London, UK, 2017; pp. 147–172.
73. Porcel López, S.; Navarro-Varas, L.; Antón-Alonso, F.; Cruz, I. La suburbanització de la pobresa com a efecte metropolità de la gentrificació: El cas de Barcelona. *Pap. Regió Metrop. Barc. Territ. Estratègies Planejament* **2018**, *60*, 94–113.
74. Gil-Alonso, F.; Thiers, J.; Bayona, J.; Pujadas, I. La population des villes est-elle ségréguée en fonction de l'âge? Géographie du vieillissement et du rajeunissement dans les grandes métropoles espagnoles. *Espace Popul. Sociétés* **2021**, 2020/3–2021/1. Available online: https://journals.openedition.org/eps/11055 (accessed on 7 May 2021).
75. Florida, R. *The New Urban Crisis: How Our Cities are Increasing Inequality, Deepening Segregation, and Failing the Middle Class and what We Can Do about It*; Basic Books: New York, NY, USA, 2017.
76. Hochstenbach, C.; Musterd, S. Gentrification and the suburbanisation of poverty: Changing urban geographies through boom and bust periods. *Urban Geogr.* **2017**, *39*, 26–53. [CrossRef]
77. Musterd, S.; Marcińczak, S.; van Ham, M.; Tammaru, T. Socioeconomic segregation in European capital cities. Increasing separation between poor and rich. *Urban Geogr.* **2017**, *38*, 1062–1083. [CrossRef]
78. Rubiales-Pérez, M. Patrones socioterritoriales de las clases altas en las regiones metropolitanas de Barcelona y Madrid (2001–2015). Ph.D. Thesis, Universitat de Barcelona, Barcelona, Spain, 2017.
79. Rubiales, M. Segregación en las metrópolis españolas 2001–2011: Un análisis con detalle territorial. *Doc. d'Anàlisi Demogràfica* **2020**, *66*, 83–105. [CrossRef]
80. Sorando, D.; Leal, J. Distantes y desiguales: El declive de la mezcla social en Barcelona y Madrid. *REIS Rev. Española Investig. Sociológicas* **2019**, *167*, 125–148.
81. Sarasa, S.; Porcel, S.; Navarro, L.; Thiers, J. Desindustrialización y crisis en la Barcelona posolímpica: ¿hacia una ciudad dual? *EURE* **2018**, *44*, 29–52. [CrossRef]
82. Ruiz-Almar, E. Zones vermelles. Desigualtat social i espais en crisi a Barcelona i la seva àrea metropolitana. *Scr. Nova Rev. electrónica Geogr. Cienc. Soc.* **2018**, *22*, 1–33. Available online: https://revistes.ub.edu/index.php/ScriptaNova/article/view/18097/22806 (accessed on 7 May 2021). [CrossRef]
83. Nel, O.; Gomà, A. Geographies of discontent: Urban segregation, political attitudes and electoral behaviour in Catalonia. *City Territ. Archit.* **2018**, *5*, 1–12.
84. Sharkey, P. Residential mobility and the reproduction of unequal neighborhoods. *Cityscape* **2012**, *4*, 9–31.
85. Musterd, S.; van Gent, W.P.; Das, M.; Latten, J. Adaptive behaviour in urban space: Residential mobility in response to social distance. *Urban Stud.* **2016**, *53*, 227–246. [CrossRef]
86. López-Gay, A. Cambio en la composición social y gentrificación en Barcelona: Una mirada a través de los flujos migratorios y residenciales. *Pap. Regió Metrop. Barc. Territ. Estratègies Planejament* **2018**, *60*, 80–93.
87. López-Gay, A.; Andújar-Llosa, A.; Salvati, L. Residential Mobility, Gentrification and Neighborhood Change in Spanish Cities: A Post-Crisis Perspective. *Spat. Demogr.* **2020**, *8*, 351–378. [CrossRef]
88. Bonvalet, C.; Bringé, A.; Imbert, C. Urban dynamics and residential trajectories in Paris. *Port. J. Soc. Sci.* **2016**, *15*, 25–46. [CrossRef]
89. Di Virgilio, M.M. Diferencias sociales en los procesos de movilidad residencial intraurbana en el Área Metropolitana de Buenos Aires (Argentina). *Quivera. Rev. Estud. Territ.* **2014**, *16*, 11–37.
90. Maloutas, T. Contextual diversity in gentrification research. *Crit. Sociol.* **2012**, *38*, 33–48. [CrossRef]
91. Kavanagh, L.; Lee, D.; Pryce, G. Is Poverty Decentralizing? Quantifying Uncertainty in the Decentralization of Urban Poverty. *Ann. Am. Assoc. Geogr.* **2016**, *106*, 1286–1298. [CrossRef]
92. Bailey, N.; Minton, J. The suburbanisation of poverty in British cities, 2004–2016: Extent, processes and nature. *Urban Geogr.* **2018**, *39*, 892–915. [CrossRef]
93. Randolph, B.; Tice, A. Suburbanizing Disadvantage in Australian Cities: Sociospatial Change in an Era of Neoliberalism. *J. Urban Aff.* **2014**, *36*, 384–399. [CrossRef]
94. Dijkstra, L.; Poelman, H. Cities in Europe. The new OECD-EC definition. *Reg. Focus* **2020**, *1*, 1–13.
95. Pujadas, I.; Bayona, J.; Rubiales, M. Movilidad residencial en edades avanzadas en España: Una perspectiva metropolitana. *Finisterra Rev. Port. Geogr.* **2016**, *LI*, 121–142.
96. Módenes-Cabrerizo, J.A. La inseguridad residencial por problemas económicos en España comparada con el entorno europeo. *Pap. Rev. Sociol.* **2017**, *102*, 673–703. [CrossRef]
97. García-Docampo, M.; Otero-Enríquez, R. Transición territorial: Modelo teórico y contraste con el caso español. *REIS. Rev. Española Investig. Sociológicas* **2012**, *139*, 133–162. [CrossRef]

98. Nel·lo, O. Spain: Changing century, changing cycle? Large Spanish cities on the threshold of the twenty-first century. In *National Policy Responses to Urban Challenges in Europe*; van den Berg, L., Braun, E., van der Meer, J., Eds.; Routledge: London, UK; New York, NY, USA, 2007; pp. 333–360.
99. Wolff, M.; Haase, A.; Haase, D.; Kabisch, N. The impact of urban regrowth on the built environment. *Urban Stud.* **2017**, *54*, 2683–2700. [CrossRef]
100. García-Coll, A.; López-Villanueva, C. Crisis y continuidad en el urbanismo disperso: La Región Metropolitana de Barcelona. *Rev. Andal. Cienc. Soc.* **2019**, *17*, 1–21.
101. Borsdorf, A.; Hidalgo, R. The Fragmented City. Changing patterns in Latin American cities. *Urban Reinventors Online J.* **2009**, *3*, 1–18.
102. Borsdorf, A. Cómo modelar el desarrollo y la dinámica de la ciudad latinoamericana. *EURE* **2003**, *29*, 37–49. [CrossRef]
103. Haddad, M.A. Residential income segregation and commuting in a Latin American city. *Appl. Geogr.* **2020**, *117*, 102186. [CrossRef]

urban science

MDPI

Article

The Evolution of Urban Planning in Medium-Sized Catalan Cities (1979–2019)

Carme Bellet Sanfeliu

Department of Geography and Sociology, University of Lleida, 25003 Lleida, Spain; carme.bellet@udl.cat

Abstract: Urban planning, as well as the type of city in which it takes place and is promoted, has changed a lot in Spanish cities since the return to democratically elected municipal governments in 1979. This work seeks to characterise the transformation that urban planning has undergone over the last 40 years. It sets out to do this by studying the cases of two medium-sized Catalan cities, their underlying city models, and the ways in which planning has been defined and managed in Catalonia. All of this was undertaken through a bibliographic and documentary analysis of the approved planning documents, which was accompanied by a study of the population dynamics and building cycles. In Spain, urban planning has been one of the instruments used to catalyse expectations for economic growth based on land consumption through urbanisation. Within this context, planning has progressed from fulfilling an initial requirement to regulate activities and urban growth (1979–1991) to facilitating urban development through a clearly expansive and speculative form of neoliberal urbanism (1993–2007) and, finally, to assuming a form in which these previous tendencies coexist with certain new orientations.

Keywords: urban planning; master plans; urban projects; medium-sized cities; neoliberal urbanism

Citation: Bellet Sanfeliu, C. The Evolution of Urban Planning in Medium-Sized Catalan Cities (1979–2019). *Urban Sci.* **2021**, *5*, 36. https://doi.org/10.3390/urbansci5020036

Academic Editors: Juan Manuel Parreño Castellano, María José Piñeira-Mantiñán and Jesús Manuel González Pérez

Received: 19 February 2021
Accepted: 16 March 2021
Published: 13 April 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the author. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Approach, Objectives, and Methodology

As several other works have already highlighted, since the mid-20th century, in Spain, there has been a strong connection between economic growth and that of the building sector. At times, this has appeared to be so close that it has even led some authors to speak of Spanish property capitalism [1,2]. There is little doubt that this has produced an expansive, speculative, and unsustainable urban model and has resulted in a frenetic rhythm of urbanisation [3,4].

Urban planning and development have been the main instruments used to catalyse expectations for economic growth, and are almost exclusively based on the consumption of land [5]. This has occurred at a time when the expectations for capital gains generated by urbanisation have proved greater than those associated with any other form of economic activity [6]. The city and the production of urban products have therefore become a mechanism for the absorption of capital surpluses for their subsequent integration within the circuit of accumulation [7,8].

This article suggests the existence of a relationship between the characteristics of urban planning, the models of urbanisation that underlie them, and the resulting urbanisation processes. To demonstrate this, we have outlined the main proposals and approaches of the urban Master Plans of two medium-sized Catalan cities—Lleida and Manresa—and analysed their development and the dynamics of their urbanisation and growth.

These case studies were selected based on the following criteria: Firstly, both of the cities studied have a certain demographic size, perform the function of being local capitals, and play a significant role in the territorial articulation of their respective areas of inland Catalonia; secondly, in Catalonia, great efforts have been made to review urban planning procedures in this kind of city since the transfer of competencies relating to urban planning and its regulation from Spain's central government to the autonomous regional government

in 1978; and, thirdly, both municipalities—Lleida and Manresa—have had three different Master Plans approved since the first democratic municipal elections held in 1979. These make it possible to characterise the evolution of urban planning in these cities during different periods of Spain's recent democratic history.

To establish the context, we shall first characterise urban planning in Spain and Catalonia through a bibliographic and documentary analysis, which will be cited in the second section of this article. For this analysis, we established three different periods: 1979–1991, 1992–2007, and 2008–2019, as shown in Figure 1. This delimitation is based on the evolution of the dynamics of the real estate cycle [9].

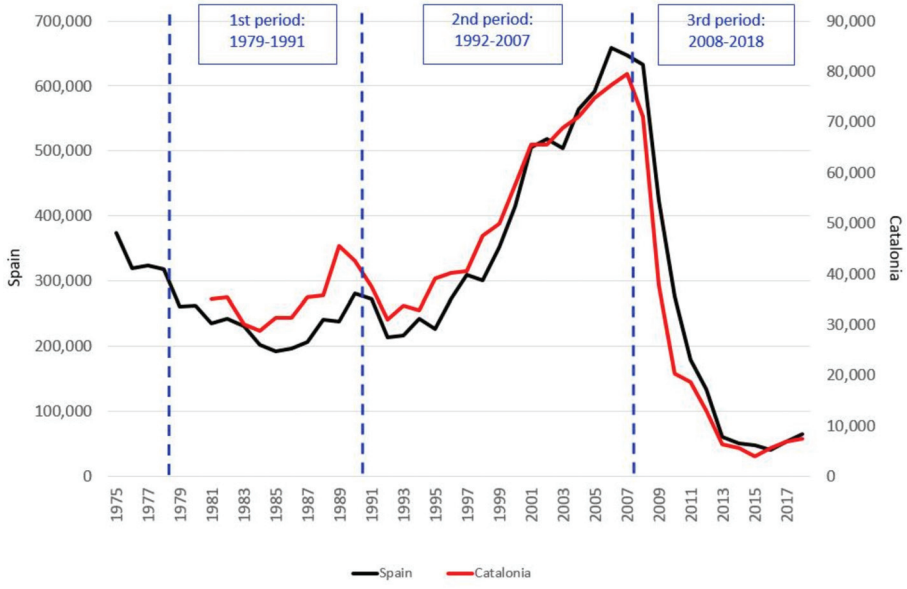


Figure 1. Property dynamics in Spain and Catalonia and urban planning periods. Housing units built in Spain (**left axis**) and Catalonia (**right axis**) (data from https://www.mitma.gob.es/vivienda (accessed on 23 March 2019) and http://habitatge.gencat.cat/ca/dades/estadistiques_publicacions/ (accessed on 20 March 2019).

To study urban planning in Manresa and Lleida, we consulted the local urban planning archives of their respective provinces (Barcelona and Lleida), where we examined the different Master Plans and all relevant approved planning documentation since 1979. Data were also obtained from the Censuses of Population and Housing issued by Spain's *Instituto Nacional de Estadística* (INE—National Institute of Statistics) for the years 1981, 1991, 2001, and 2011, and from the *Padrón Municipal de Habitantes* (Local Population Register) of 2019. This information was also used to help us illustrate the growth dynamics of these municipalities and their respective urban areas.

Following the approval of the Spanish Constitution in 1976, there was a process of decentralisation of competences relating to regional planning, urban planning, and housing, with these being transferred to the different Autonomous Communities [10]. This has since resulted in the development of seventeen different frameworks for urban planning policy. Despite certain formal differences, and as previously noted in several other comparative studies [11,12], these remain similar—in both content and structure—to the system that was proposed under the national Land Use and Urban Planning Act, which was passed in 1976 (Royal Decree 1346/1976, of 9 April).

The Land Act of 1976 established a hierarchical structure of municipal planning instruments, amongst which it is possible to highlight the following characteristics:

- Master Plans (the *Plan General*, *Plan General de Ordenación*, or *Plan de Ordenación Urbanística Municipal*). The Master Plan is the key element in Spanish urban planning, as it defines the model for urban evolution and land use within a given municipality. The Master Plan is an instrument for integrated urban planning within the municipality. It classifies land, defines the general urban structure of the territory, and presents a programme for its development. It is also a key document for establishing the legal status of land, and has important implications within property law (establishing faculties for its use, enjoyment, and exploitation).
- The Master Plan contains a classification of all the land in the municipal area. It makes distinctions between: *Suelo Urbano* (urban land), which is the urban area that has already been more or less urbanised and built upon; *Suelo Urbanizable* (land zoned for development), which is land that could potentially be developed and which could be classified as either sectorialised or delimited (whose development requires the approval of a *Plan Parcial* (Partial Plan)), or as non-sectorialised or non-delimited land (which requires a much longer bureaucratic process); and *Suelo No Urbanizable* (land not zoned for development), or rustic land, which is land that cannot be developed and/or which is incompatible with urban development.
- Different figures involving more detailed planning proposals can be used to develop the Master Plan. The most significant of these figures are: *Planes Parciales* (Partial Plans), *Planes Especiales* (Special Plans), and a number of other plans of more limited scope. The *Plan Parcial* is the key instrument used for developing *Suelo Urbanizable* (land zoned for development): the land that the Master Plan classifies as being suitable for urban development. This is the first step in the process of transforming rustic land into urban land.

Another figure characteristic of the planning derived from the Master Plan is the *Plan Especial* (Special Plan). This is the most appropriate figure for undertaking interventions (whether involving reform or improvement) within the existing city. Special Plans are also appropriate instruments for protecting unique settings: historic centres, spaces of historical and artistic interest, and spaces of natural, environmental, or scenic interest, amongst others.

2. The Evolution of Urban Planning in Spain and Catalonia: 1979–2019

Despite the existence of certain differences in the urban planning policies carried out in different Autonomous Communities since the transfer of competences from the central government, there still exists a general Spanish framework [11,12]. In this section, we shall contextualise and characterise the evolution of urban planning from the time of the first democratic local councils (1979) through to the present day. We shall also explain the changes that have occurred in the city model on which urban planning was based in the different periods that we have previously identified.

2.1. The Revision of Previous Planning and the New City Model Associated with "Urbanismo Urbano" (1979–1991)

The first of our periods extends from the time of the first democratic elections for local councils—in 1979—until 1992. The newly elected municipal councils faced the task of defining new municipal agendas within which urban planning was to play a central role. They began to revise their Master Plans in a task that went beyond simply adapting them to the precepts of the new Land Act of 1976. Local councils took advantage of this situation to change the focus of the model and the contents of their Master Plans, revising any building ordinances and norms that could be considered speculative or that had been based on previous over-dimensioned expectations for growth. The new documents gave priority to restructuring, reforming, and improving the existing cities through a type of urban planning that was described as *urbanismo urbano*—literally, "urban" urban planning [13]. In this way, general urban reform and transformation were imposed in an attempt to offset the disproportionate growth of the previous period.

In Catalonia, following the transfer of competences in 1978, the corresponding Department of the *Generalitat de Catalunya* focused its attention on revising the existing Master Plans and drafting new ones. As a result, during this period, a large number of Master Plan documents were passed, whose contents clearly differed from those of the 1960s and 1970s. New planning documents expressed a willingness to face up to the main urban problems that had been inherited from the previous period. They also offered a way to increase urban provisions and to put an end to the previous process of "*desarrollismo*" (excessive urban growth promoted during the final decades of dictatorship) [13].

The first step towards achieving this involved changing the status of land and reducing the amount of land classified as *Suelo Urbanizable* (land for urban development), much of which became either *Suelo Urbanizable no delimitado* (non-delimited land, which required a much longer bureaucratic process before it could be developed) or *Suelo no Urbanizable* (land not zoned for development). Secondly, not only was the quantity of land to be developed reduced, but also its densities and buildable areas. This downward shift in densities also applied to the *Planes Parciales*, which were used to develop the land classified in Master Plans as *Suelo Urbanizable* and were submitted for approval or had already been approved.

When it came to classifying new land for urban development, these proposals offered a new way to complete the urban structure and to integrate semi-consolidated urban areas. Furthermore, much of the zoning, which had often been very general and inappropriate for its location, was revised, as were the maximalist building ordinances. Finally, there was a general increase in the amount of land set aside for urban amenities and open and green spaces.

In the management and deployment of new (or revised) Master Plans, the most significant planning figure was the *Plan Especial*, whether for urban reform, improvement, or protection. Its special importance derived not only from the great number of documents drafted and approved in Catalonia, but also from the fact that it became one of the figures that best reflected the aim of the urban planning and policies undertaken during this period. Its main objectives were to make improvements to and to reform the existing city, and also to protect its historic centres and areas of natural interest. Even so, the characteristics and nature of these documents were set to change when what started as (often rather ambitious) social projects were later converted into more formal and architectonic projects [14].

Furthermore, with attention moving to the more or less consolidated city, insufficient attention was given to the protection of spaces of special (environmental, natural, or scenic) interest, to the protection of vulnerable spaces on *Suelo No Urbanizable* (land not zoned for development or rural land), and to supramunicipal coordination. All of that was needed at a time when processes of suburbanisation and peri-urbanisation were in full swing in the metropolitan areas, and they were also starting to emerge in the spaces surrounding medium-sized cities in the most dynamic territories [15,16].

2.2. Speculative and Expansionist Urban Planning Associated with the Property Boom (1992–2007)

During the second period, between 1992 and 2007, there were notable changes in Spanish urban planning. On the one hand, these were associated with the new socioeconomic and financial context; on the other, they owed much to the widespread application of neoliberal policies [4,17].

The most important legal changes that occurred during this period were the result of the deregulation of the mortgage and land markets as a consequence of the amended Land Use and Assessment System Act: Law 6/1998 [18]. This soon became popularly known as the "law that allowed everything to be developed", as it effectively allowed any land that was not expressly protected to be potentially available for urban development.

Instead of regulating urban growth, urban planning used all its available resources to encourage and exacerbate urban production. The city and its surrounding territory were converted into both the subject and object of accumulation through the classification of large swathes of municipal terrain as *Suelo Urbanizable* and continual modifications to the previously approved planning regulations [3,19].

Furthermore, the traditional regulatory role of urban planning was relegated to a secondary position, while pride of place was afforded to strategic planning and the development of large-scale urban projects. This expressly implied renouncing the definition of a specific model for both the city and its territory [20,21].

In Catalonia, a second generation of Master Plans was drawn up under the new Urban Planning Law—2/2002 [22,23]. These Master Plans, which were mainly passed in the 1990s, did not result in any great changes in either the approach to urban planning or the nature of its documents, but heralded the introduction of several new visions, amongst which we can highlight the following:

- The city, or urban area, tried to connect certain proposals (regarding the structure and organization of the nuclei and their respective transport systems, housing, open-space areas, public amenities, etc.) by introducing wider regional (and supramunicipal) considerations. In Catalonia, from 2004 onwards, one of the most important lines of spatial planning specifically focused on deploying regional planning at the supramunicipal scale: Partial Territorial Plans (*Plans Territorials Parcials*, in Catalan). These plans were approved with the intention of preserving natural and landscape assets and controlling urban growth at the subregional intermediate scale [24,25].
- The inclusion in Master Plans of large urban and intermediate-scale projects that were qualified as strategic and for which specific management mechanisms were designed [9,26].

What has come to be called the urbanising tsunami, or the prodigious decade of Spanish urbanism (1997–2008), was publicly encouraged by urban planning legislation, management, and fiscal and economic policy, and was dependent on sources of local finance [27,28]. The causes and consequences of this unique form of urban and property expansion have already been examined in numerous other works [3,4,27–30], amongst others). The only reflexion that we would like to add here is the following paradox: The greatest urbanisation process, and the most speculative one in Spanish urban history, coincided with the moment of the greatest urbanistic and territorial regulation.

The legacy of this period was one of Master Plans with provisions for unconstrained growth, poorly integrated and over-scaled urban projects, and—above all—great urban voids with land that had been prepared for urban development and construction but was not consolidated. This was a pattern that was repeated and spread across the length and breadth of the country. Indeed, it is one that still persists today, particularly in large areas of the interior of the Iberian Peninsula, where many landscapes reflect the bursting of the property bubble, whose consequences have lasted until today.

2.3. The Changes of Post-Crisis Urban Planning: The Exploitation of More Centrally Located Capital Gains (2008 Onwards)

After the excesses came the National Land Law 8/2007 of 28 May 2007, which consolidated the Land Use and Urban Planning Act. Even so, this arrived late and was insufficient for what it was meant to correct. Amongst other questions, this law established that it was only possible to classify as *Suelo Urbanizable* that which was specifically required to meet the needs that justified its urbanization, it protected land owners from promoters undertaking transformation projects, and it increased—to a minimum of 30%—the amount of total residential building destined for social housing. With the arrival of the property crisis in 2007, there was a change in the property cycle and in the focus of urban planning towards the inner areas of the city. Faced with the impossibility of continuing with the previous logic of land development, post-crisis urban planning brought a change in the expansive urban model. It was in this context that the first period of discourse of "*urbanismo urbano*" also reappeared. Some of the first consequences of these new visions were revisions of previous excessive provisions for *Suelo Urbanizable* that were contained in inherited Master Plans.

Attention now returned to urban land and to more centrally located areas in an attempt to exploit potential capital gains through small-scale interventions. This change

was reflected in the generation of new Master Plans, which now contained interventions in urban centres that included a level of detail that was almost on a par with that of an intervention project.

These central interventions were also promoted by Law 8/2013 on Urban Rehabilitation, Regeneration, and Renewal, which was popularly known as the "3Rs Law". After the crisis, the new property development strategies abandoned the previous grandiose operations on the urban periphery and sought, instead, to undertake development projects based on rehabilitation and renewal in the inner parts of cities [31]. This implied a number of functional changes as well as changes in the socioeconomic profile of the population [32]. At the same time, some large-scale projects were recovered, especially following the slight recovery of the property market that occurred in 2016. This helped to consolidate cities that had been fragmented, deprived, and colonised by financial capital [30,33].

Meanwhile, and from 2008 onwards, a set of spatial planning tools were also approved in Catalonia. The aim was to manage urban growth based on a physical planning approach and to preserve natural values and the landscape. In fact, most of the Partial Territorial Plans, as well as the land-use planning applied at the subregional scale, were approved in this period. Moreover, after the Catalan Landscape Act of 2005, seven landscape catalogues that identified the most important natural and cultural values and proposed a set of basic guidelines for their preservation were approved.

Unfortunately, the planning apparatus of this period arrived late, and this could be interpreted as a means of validating autonomous urbanization processes once they had been consummated.

3. Lleida and Manresa: Territorial Context and Dynamics of Population Growth and Housing

Manresa is a municipality with an area of 41.66 km^2 and a population of 77,714 [34]. It is the capital of the *comarca* (local district) of El Bages in the province of Barcelona. It stands on a plain located within the central depression of Catalonia, and its urban development has been shaped by the rivers Llobregat and Cardener and by the surrounding uplands. The economy of Manresa and its urban area is based on historic industrialisation, and the city currently houses the largest concentration of specialised services and amenities in central Catalonia. The urban area around Manresa delimited by the *Ministerio de Transportes, Movilidad y Agenda Urbana* MITMA [35] is relatively small (Figure 2). Manresa had a population of 104,947 in 2019, with a surface area of 96.9 km^2. Its metropolitan area includes four municipalities: Manresa (77,714 inhabitants in 2019), San Joan de Vilatorrada (10,936), Sant Fruitós de Bages (8703), and Santpedor (7554). As shown in Table 1, over the last decade, Sant Joan de Vilatorrada—which practically forms a conurbation with Manresa—Santpedor, and Sant Fruitós de Bages have all grown more than the municipality of Manresa itself.

The case of the urban area of Manresa is of interest for a number of reasons. Firstly, this is one of the areas in Catalonia with the longest histories of urban planning at the supramunicipal scale. The *Pla Director Urbanístic del Bagès* (PDU El Bages, 2006) is a supramunicipal urban plan that covers a total of 27 different municipalities around Manresa. It has been used to guide and coordinate local planning in response to notable transformative dynamics and to find solutions to the problems faced by this area, as well as those related to the infrastructure and open spaces located within this territory. The proposals and instructions contained in the PDU of El Bages were later included in the corresponding Regional Plan, the *Pla Territorial Parcial de les Comarques Centrals* (PTPCC) of 2008, and were developed through the *Pla Territorial General de Catalunya* (PTGC). It is interesting to study Manresa because it has passed three Master Plans since 1979, and thus allows us to analyse the evolution of different generations of this kind of plan [37].

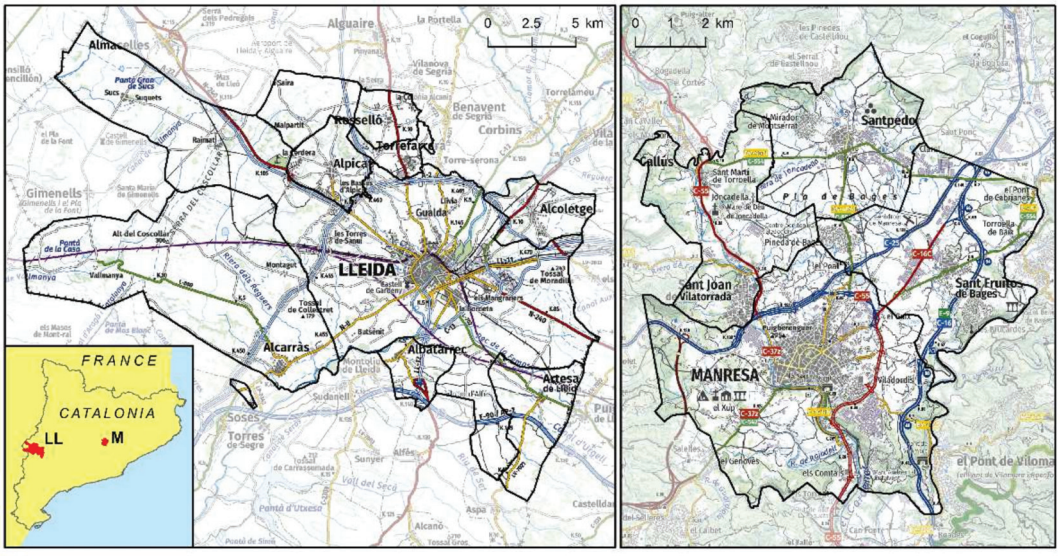


Figure 2. Urban areas and municipalities of Lleida and Manresa. Own elaboration based on *Institut Cartogràfic i Geològic de Catalunya* [36].

Lleida, on the other hand, has a surface area of 212.30 km^2 and a population of 138,956 [34]. It is the service capital of an extensive area, with a notable degree of specialisation in the agricultural and agro-industrial sectors, and is located on the Lleida plain in western Catalonia. The urban area of Lleida, which is notably larger than that of Manresa, has an area of 426.3 km^2 and includes eight municipalities with a total population of 169,620 (2019), 81.9% of which lives in the central municipality of Lleida (Figure 2). According to the MITMA Atlas [35], the other municipalities in this area are: Albatàrrec (2221), Alcarràs (9514), Alcoletge (3420), Alpicat (6255), Artesa de Lleida (1504), Rosselló (3145), and Torrefarrera (4605 in 2019). As in the case of Manresa, the relative growth of the population, housing, and urbanised land in the neighbouring municipalities has been noticeably greater than in the central city. In fact, some have already become conurbations in their own right, as in the case of Alpicat and Torreferrera.

The municipality of Lleida, as well as its urban area in general, enjoys excellent connectivity via high-capacity transport infrastructure. In contrast, it has less experience than Manresa in supramunicipal and regional planning. The *Pla Territorial Parcial de les Terres de Lleida* was passed in 2004 and, to a certain extent, has since conditioned the growth of the municipalities in its immediate vicinity by promoting the city of Lleida as the main pole in the territory. As in the case of Manresa, the municipality has had three General Urban Plans since the restauration of democracy [38].

Table 1. The dynamics of population growth and housing in the municipalities and urban areas of Manresa and Lleida [39].

	Population	Dynamics of Annual Population Growth				Housing Units	Dynamics of Annual Housing Growth		
	2019	1981–1991	1991–2001	2001–2011	2011–2019	2011	1981–1991	1991–2001	2001–2011
Municipality of Manresa	77,714	−0.1	−0.4	1.9	0.2	39,605	0.9	1.7	2.1
Manresa Urban Area	106,926	0.3	0.1	2.1	0.3	51,530	1.1	2.0	2.5
Municipality of Lleida	138,956	0.5	0.0	2.2	0.2	66,415	1.5	2.4	1.6
Lleida Urban Area	169,620	0.5	0.2	2.8	0.3	79,825	1.6	2.3	2.3

The two areas experienced moderate growth in population and housing in the 1980s and 1990s, with annual growth rates of less than 0.5%. They then experienced more important growth during the first decade of the 21st century, mainly due to immigration.

This growth was, as can be seen from Table 1, particularly notable in Lleida and its urban area.

Another similarity between the two areas is the higher relative growth experienced by the other municipalities in these areas. This growth was particularly related to processes of suburbanisation and peri-urbanisation, whose dynamics were very closely related to those of residential migration from their respective central cities. This explains the extraordinary growth in population and housing in municipalities such as Alcarràs, Torrefarrera, Alcoletge, and Albatàrrec within the urban area of Lleida and the more modest growth of Santpedor and Sant Fruitós del Bages in that of Manresa. In fact, the dynamics of the markets for property and land, as well as their consequences, have been supramunicipal in both areas since the 1980s.

Despite all this, and despite the existence of regional planning in Catalonia, the urban planning and land policies carried out have tended to reflect municipal interests and logics. The forecasts for growth and land-use development (and housing) policies in these smaller municipalities have been oversized and have competed with each other. Furthermore, although Catalonia was one of the first Spanish autonomous communities to legislate for regional planning, this territorial regulation arrived quite late (the *Pla Territorial General de Catalunya*, *Ley 1/1995* of the *Generalitat de Catalunya* was not developed until the first decade of the 21st century) and could not slow down a series of already notable processes of urban growth and urban sprawl.

4. The Evolution of Urban Planning: Lleida and Manresa (1979–2019)

4.1. The First Period (1979–1991)

Within a context of social and political change, the municipalities of Lleida and Manresa agreed to revise their respective Master Plans (*Planes Generales*); the former was passed in 1979, and the latter in 1981. Both revisions went far beyond simply adopting the regulations laid out in Spain's Land Act of 1976; instead, they considered the reorganisation of urban planning and of the regulatory norms contained in the previous Master Plans. Both new plans also perfectly reflected a reorientation in planning that had been promoted in Catalonia since the final years of the transition to democracy by professionals trained at the *Escola Tècnica Superior d'Arquitectura de Barcelona* (ETSAB; *Universitat Politècnica de Catalunya*). Particular attention was given to urban form, the morphology of tissues, urban structure, and the capacity to recompose urban space through interventions in public space. These were just a few of the hallmarks of the ETSAB, and they were perfectly reflected in both documents.

In these Master Plans (Table 2), the first steps were taken to reduce the excessive potential for growth of earlier plans. They were also used to correct the destructuring effects of previous inappropriate land development (whether due to their location, characteristics, or insufficient initial planning). In the case of Manresa, the new plan envisaged a drastic reduction in densities; with a similar quantity of land, the previous plan had foreseen housing for up to 260,000 inhabitants. In Lleida, the Plan of 1979 contemplated a maximum population of 150,000 for the year 1999. This was very similar to that outlined in the Plan of 1957, which had foreseen a total population of 137,369. In both cases, densities were reduced with respect to the provisions of many of the previous *Planes Parciales*, and fewer sectors were projected than in previous planning processes. It was also planned to increase the provision of amenities and open spaces.

Table 2. Potential for growth, housing, and land classification in the different Master Plans for Lleida and Manresa [40].

Lleida	**1979**	**1999**	**2018—Initially Approved**
Maximum potential for growth in population	150,000	144,623 (200,000 PTGC)	136,000–170,000
Potential growth for housing units (a)	——-	25,781 units	29,298 units (b)
Land classified as urban	1234 ha	1430.47 ha	1823.8 ha
Delimited land for urban development	132.68 ha	503.8 ha(385 ha residential land.)	239.1 ha (61.4 Ha residential land)
Non-delimited land for urban development	1340.64 ha	307.58 ha	531.3 ha
Total land available for urban development	1473.32 ha	811.38 ha	770.4 ha
Manresa	**1981**	**1997**	**2017**
Maximum potential for growth in population	135,000–150,000	90,000	92,042–100,000
Potential growth for housing units (a)	——-	13,246 units	10,505 units
Land classified as urban	631.52 ha	642.25 ha	778.99 ha
Delimited land for urban development	77.79 ha	164.0 ha	153.507 ha
Non-delimited land for urban development	176.32 ha	223.7 ha	56.36 ha
Total land available for urban development	254.11 ha	387.76 ha	209.867 ha

a—Potential housing on unconsolidated urban land and delimited/sectorialised and non-delimited/non-sectorialised urban land. b—10,295 housing units on unconsolidated urban land and 15,909 on undelimited land earmarked for urban development.

In the case of Lleida (Figure 3), most of the 1340 ha of land classified as *Suelo Urbanizable No Delimitado* (non-delimitated land destined for urban development) in the 1979 Master Plan came from a project inherited from the Francoist period. This project had foreseen the development of an area to the west of the city, but separated from its main urban nucleus, through the construction of a major development to house 20,000 people with more than 5000 housing units; it was almost a new city and was to be called Ilerda 2000. However, the only buildings finally constructed in that area were a number of public amenities. The subsequent 1999 Master Plan finally changed the status of this land.

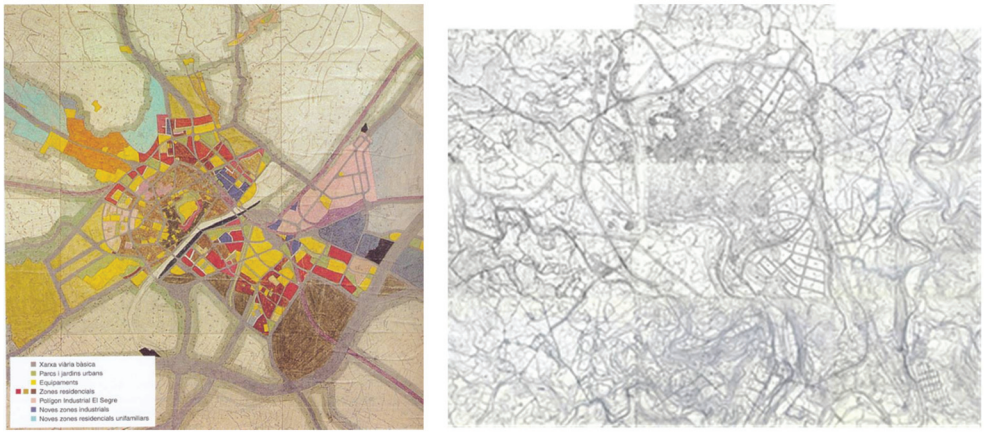


Figure 3. *Plan General Municipal de Lleida* of 1979 (**left**), reprinted with permission from ref. [41] and *Plan General Municipal de Manresa* of 1981 (**right**), reprinted with permission from ref. [42].

In the case of Manresa, the proposals set out in the Master Plan of 1981—especially those relating to land classification—also took into account the dynamics and development of urban land in the municipalities of its urban area. As a result of the crisis within the sector, some delimited land that had initially been earmarked for urban development

became non-delimited, or even land not destined for urban development. Most of this this land was for industrial uses. As a result, the densities contemplated in the *Planes Parciales* (Plans for Urban Development) for residential uses fell considerably. It should be noted that the previous plans had foreseen a similar quantity of land being occupied by up to 260,000 inhabitants.

Both city planning processes followed the same general trends:(1) They changed from plans with rather abstract zoning to plans with a more committed physical form; (2) they revised and reduced the oversized previsions for growth inherited from the previous period; (3) they focused more on reforming and improving the city that had already been consolidated than on growth, and they established a good number of Special Plans for the improvement of urban spaces and in order to provide better urban facilities; and, finally, (4) they were much more precise in the way that the systems for their development were defined and in their explanations of how they should be carried out.

In Lleida, for example, the development of the 1979 Master Plan had implied the approval of six *Planes Parciales* for urban development: four with residential uses (Joc de la Bola, Balàfia Nord, sector F of La Bordeta, and the University Campus area) and three with industrial uses (Camí dels Frares and Creu del Batlle), which affected a total area of almost 200 ha. There were then a further twenty-six *Planes Especiales* for improvement and urban reform, as well as a provision for another thirty-four more detailed action units. At the same time, the development of the 1981 Master Plan for Manresa implied the approval of four *Planes Parciales* for Les Bases, La Parada, Concòrdia, and Ametllers, as well as twenty-three *Planes Especiales*. These were drawn up and approved to improve and reform the existing urban land.

In both cases, it is important to highlight the approval of *Planes Especiales* for the improvement and dynamisation of their respective Historic Centres: the *Pla Especial del Centre de Lleida* of 1986 [43] and the *Pla Especial de Millora Urbana del Centre Urbà de Manresa* of 1985. Both city plans sought to combat processes of urban degradation, to recover the functional centrality of these historic centres, and to give value to/protect urban heritage.

We also found *Planes Especiales* for organising and developing more or less centrally located brownfield sites and derelict land, which had previously been excluded from the market for different reasons, such as topography, speculative reasons, former industrial land (e.g., Els Panyos and La Florinda in the case of Manresa), spaces previously occupied by large-scale railway infrastructure (the *Pla Especial del Recorrido* of 1984 in Lleida, which covered 9.96 ha), and the reconversion of former military installations, in Manresa. On the one hand, the planning of these sites made it possible to overcome internal barriers and to integrate previously derelict urban spaces; on the other, it presented a unique opportunity to improve the provision of amenities and open spaces within these cities. A good number of these interventions were carried out through public acquisitions of land by local administrations.

4.2. The Second Period (1992–2007)

The Master Plans for this period were passed in 1997 (Manresa) and 1999 (Lleida) and had very different characteristics. First of all, it is important to underline the differing expectations for growth and land development in the two cities (Figure 4). In the case of Manresa (Table 2), there was a notable reduction in expected population growth, and therefore, very little land was classified and earmarked for urban development (164 ha of land for delimited/sectorialised urban development and 223.7 ha for non-delimited urban development). In the case of Lleida, the city took as its horizon the maximum population established by the regional plan, which was passed as part of Ley 1/1995 of the *Generalitat de Catalunya:* the *Pla Territorial General de Catalunya*. This foresaw the growth of the municipality to a maximum population of 200,000 in 2015. However, the demographic forecast that accompanied the document only foresaw (in the most optimistic of cases) the city's population reaching 144,600 by the same year. With this in mind, it classified a large volume of land, 503 ha of land delimited for urban development (385 ha of which was for

residential uses), and projected a total of 25,781 new housing units (on land reserved for urban development, but had not yet been consolidated as urban land).

The technical characteristics and contents of these plans corresponded to those identified in the second generation of Master Plans undertaken in Catalonia following the return to democracy [44]. The *Planes Generales* identified communications and transport infrastructure as being key concerns for medium-sized cities: It was believed that they would help to reinforce their functions as the capitals of their respective territories. This was one of the most outstanding issues in the Plan General for Manresa of 1997. This established "the correct integration of the city within its territory, ensuring optimum accessibility through its connection to road and rail transport infrastructure" [45] (point 2) as one of its most important objectives. The *Plan General* for Lleida identified the integration of the city within the high-speed railway network as one of its strategic projects; this was achieved when this infrastructure reached the city in 2003 [46].

The Master Plan documents also identified other key projects that could be considered strategic. Both plans proposed the transformation of the urban courses of rivers—the River Segre in Lleida and River Cardener in Manresa—into public spaces and the requalification the urban facades and banks of both rivers. Both documents also proposed the continuation of the task of recovering their respective historic centres, which was to be considered a key urban project. To achieve this, they created mechanisms for the active management and implementation of land policy through their respective municipal land management companies. Lleida's *Empresa Municipal de Urbanismo* and Manresa's *Forum* were both established in 1994.

Other projects regarded as strategic within the respective Master Plans were science and technology parks. The Manresa project for the *Parc Tecnològic de la Catalunya Central* began in 2005. It focused on 35 ha of land (22 ha of which were destined for the creation of a large park: the Parc de l'Agulla) shared with the neighbouring municipality of Sant Fruitós del Bages. In Lleida, work on the *Parc Científic i Tecnològic Agroalimentari de Lleida* (PCiTAL) also began in 2005 thanks to a consortium between the *Universitat de Lleida* (UdL) and the City Council, and with support from the European programme FEDER. Many of the PCiTAL's buildings were housed in what had previously been a military complex up on Gardeny hill—an elevated platform with a total surface area of 28 ha.

The biggest difference between the two Master Plans was in how they were to be developed and, in particular, the use of their *Planes Parciales* (Plans for Urban Development) to develop new urban land. In Lleida, 15 *Planes Parciales* were passed, and in Manresa, there were 16. The impact of their approval, as well as of the resulting urban land development, can be seen in Table 2, which compares figures relating to urban land corresponding to the last two Master Plans. In the case of Lleida, the difference in the amount of urban land between the Master Plans of 1999 and 2018 totalled 400 ha; in Manresa, the development of urban land was much more restricted, with an increase of around 130 ha between the Master Plans of 1997 and 2017.

Another of the issues that should be highlighted concerns the large number of modifications made to the Master Plans passed during this period. In both of the cases studied here, these modifications distorted the original Master Plans and their initial objectives. In the case of Manresa, there were fifty-nine modifications to the *Plan General* of 1997. In that of Lleida, there have been seventy-six since it came into force in 1999, although many of these have not involved fundamental changes.

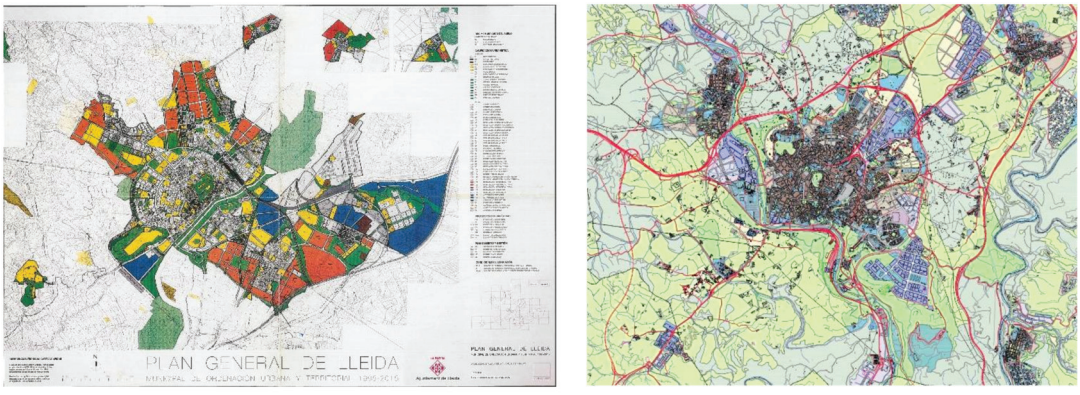


Figure 4. *Plan General de Lleida* of 1999 (**left**) reprinted with permission from ref. [47] and *Plan General de Manresa* of 1997 (**right**) reprinted with permission from ref. [48].

4.3. The Third Period (2008–2019)

Finally, there are the Master Plans corresponding to the most recent period: the *Plan de Ordenación Urbana de Lleida* of 2018 (which was initially passed, but then subjected to revision by the city's new management team following the municipal elections of 2019) and the *Plan de Ordenación Urbana de Manresa*, which was passed in 2017. The first things that should capture our attention in both cases are the restrictive previsions for growth and, in line with this, restrictions in the classification of land for urban development. In the case of Lleida (see Table 2), the area was 239.1 ha (with only 61.4 ha of this land being destined for residential uses). Even so, 531.3 ha were classified as non-delimited land for urban development, the majority of which was destined for industrial and logistical uses. In the case of Manresa, only 153.5 ha were classified as delimited land for urban development and 56.4 ha as non-delimited.

However, without a doubt, what should most attract our attention was the detailed organisation and regulation of the urban land that was already more or less consolidated (Figure 5). In the case of Lleida, it is relevant to add that seven *Planes de Mejora Urbana* (special plans for urban improvement) were proposed, including seventy-five areas/sectors for more detailed urban redevelopment, all of which have been used as instruments for the transformation of urban land. In Manresa, on the other hand, the current Master Plan contemplates fifty-three *Planes de Mejora Urbana* (special plans for urban improvement), seven of which only contemplate very specific transformations, in addition to a further eighty-five for more detailed urban redevelopments. Amongst these interventions, it is relevant to highlight those dedicated to dynamising the urban centres (historic centres and areas of historic urban growth), which have placed an important emphasis on fostering the regeneration of the urban fabric and reorganising mobility.

Another interesting question concerns the specific treatment that was given to land that could not be subjected to urban development in order to try to protect spaces of special natural, environmental, and landscape interest. Both cities' Master Plans sought to combine the conservation of their areas of greatest interest—in terms of land not destined for urban development—with their use as productive spaces and for leisure purposes. Along these lines, it is important to highlight, firstly, the proposal for extensive green belts, which would permit bicycle routes and footpaths crossing the municipal areas, and, secondly, regulations to protect and maintain the productivity of the rich orchards and market gardening areas that surround both these urban nuclei. In the case of Manresa, one place of particular relevance is the agricultural park. Such action was already proposed in the Plan Director Urbanístic del Bages of 2007.

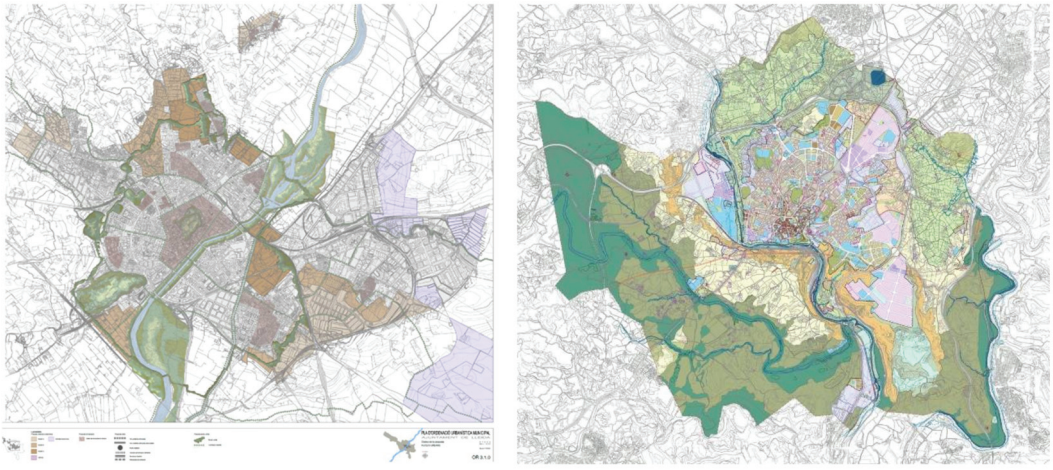


Figure 5. *The Plan de Ordenación Urbana Municipal de Lleida* of 2018 (**left**) reprinted with permission from ref. [49] and the *Plan de Ordenación Urbana de Manresa* of 2017 (**right**) reprinted with permission from ref. [50].

5. By Way of Conclusions

In Spain, urban planning has been one of the most important instruments used to catalyse expectations for economic growth. Since at least the middle of the 20th century, this has been based on the consumption of territory and the production of new urban land.

However, the objectives, strategies, and instruments of urban planning changed considerably over the course of the analysed period (1979–2019). Urban planning passed from meeting the initial demand of regulating activities and growth (1979–1991) to facilitating the development of land and construction via a form of urban planning that was neoliberal in nature and clearly expansive and speculative (1993–2007) and to reaching the present situation, with a form of urban planning in which the previously mentioned tendencies coexist with other new orientations.

An analysis of urban planning documentation also leads us to conclude that the key principles of the neoliberal city have been transferred to urban planning via overdimensioning, the reclassification and requalification of land, strategic urban projects, and the mercantilisation of areas that are expected to have a high value.

In the last period, it seems that urban planning has largely gone back to focusing on the more or less consolidated parts of the cities. The main emphasis has now apparently returned to urban regeneration and rehabilitation, rather than urban growth. Even so, it is not yet clear whether the existing and established mechanisms, their development, and their management will—or will not—generate even greater urban fragmentation. The content and objectives of urban plans should perhaps give greater attention to the social dimension and understand that the ultimate objective of urban planning should be to make the lives of the people who live in our cities easier and more pleasant, rather than to promote property business.

The impact of two recent crises, the economic crisis of 2007 and the current (COVID-19) crisis, have led to questions being asked about the speculative approaches to urbanism that were used to produce new land and urban artefacts—including housing—while ignoring local needs and contexts. The result has been an urbanism that ignores the city and plans that lack a model for either the city or the territory. In this new context, and with the deployment of the UN International Urban Agenda (United Nations Sustainable Development Goal 11), first-level urban planning can perhaps recover its other classical mission—that of establishing the urban model and serving as an effective instrument that is adapted in order to meet the needs of cities.

Having an awareness of regional planning and conserving natural assets and landscape values have been relevant topics in the recent spatial planning agenda in Catalonia. In 2017, the Catalan government proposed a draft project for a Law of Territory that was to be an instrument for structuring the existing legislation on urban planning, regional planning, and landscape conservation. Its objectives included moving from extensive growth to urban recycling, ensuring the efficiency and competitiveness of the territorial system through formulas of supramunicipal governance, and adapting existing instruments to the diversity of the territories, interventions, and conjunctures encountered.

This draft bill did not proceed, but the need for new instruments and more agile, flexible, and comprehensive mechanisms remains imperative.

Funding: The current work was carried out within the framework of the research project entitled: "The evolution of urbanistic policies in Spain's medium-sized cities and their urban areas: 1979–2019" (RTI2018-096435-B-C21), which is financed by Spain's Ministry of Science and Innovation with the support of FEDER (EU) funding.

Conflicts of Interest: The author declares no conflict of interest.

References and Notes

1. Naredo, J.M. El modelo inmobiliario español y sus consecuencias. *Boletín CF+S* **2010**, *44*, 13–27.
2. López, I.; Rodríguez, E. *Fin de Ciclo. Financiarización, Territorio y Sociedad de Propietarios en la Onda Larga del Capitalismo Hispano (1959–2010)*; Traficantes de Sueños: Madrid, Spain, 2010.
3. Buriel, L.E. Subversion of land-use plans and the housing bubble in Spain. *Urban Res. Pract.* **2011**, *4*, 232–249. [CrossRef]
4. García, M. The Breakdown of the Spanish Urban Growth Model: Social and territorial effects of the Global Crisis. *Int. J. Urban Reg. Res.* **2010**, *34*, 967–980. [CrossRef]
5. Górgolas, P. Burbujas inmobiliarias y planeamiento urbano en España: Una amistad peligrosa. *Cuad. Investig. Urban. Ci[ur]* **2017**, *111*, 3–65. [CrossRef]
6. Harvey, D. *The Urbanization of Capital*; John Hopkins University Press: Baltimore, MD, USA, 1985.
7. Vives, S.; Rullán, O. La apropiación de las rentas del suelo en la ciudad neoliberal Española. *Boletín Asoc. Española Geogr.* **2014**, *65*, 387–408. [CrossRef]
8. Lois, R.; Piñeira, M.J.; Vives, S. El proceso urbanizador en España (1990–2014): Una interpretación desde la geografía y la teoría de los circuitos de capital. *Scr. Nova—Rev. Electrónica Geogr. Cienc. Soc.* **2016**. Available online: https://revistes.ub.edu/index.php/ScriptaNova/article/view/539 (accessed on 2 July 2020).
9. Bellet, C. Municipal planning policies in Spain: 40 years of democratic city councils (1979–2019). *Boletín Asoc. Geógrafos Españoles* **2020**, *85*, 1–38.
10. The Spanish state reserves some competences that, without being urbanistic, affect the urban environment in a very clear way. These include those outlined in the Spanish Constitution of 1976 relating to: The equality of rights and obligations (art. 149.1.1ª); civil legislation (art. 149.1.8ª); the bases for, and coordination of, the general planning of economic activity (art. 149.1.13ª); the bases of the juridical regimes of the public administrations (art. 149.1.18ª CE); basic legislation governing the protection of the natural environment (art. 149.1.23ª); and anything else that affects more than one Autonomous Community when it comes to applying sectorial policies.
11. Hernández Partal, S. Los instrumentos de planeamiento urbanístico en España. Estudio Comparado (I). *Ciudad Territ. Estud. Territ. CyTET* **2020**, *LII-205*, 613–652.
12. Hernández Partal, S. Los instrumentos de planeamiento urbanístico en España. Estudio Comparado (II). *Ciudad Territ. Estud. Territ. CyTET* **2020**, *LII-206*, 945–970.
13. Ministerio de Obras Públicas y Urbanismo-MOPU. *10 Años de Planeamiento Urbanístico en España*; Instituto del Territorio y Urbanismo: Madrid, Spain, 1990.
14. Ferrer, A. El planejament urbanístic. In *10 Anys d'Ajuntaments Democràtics*; Nel.lo, O., Ed.; Federació de Municipis de Catalunya: Barcelona, Spain, 1989; pp. 133–179.
15. Olazabal, E.; Bellet, C. De la ciudad compacta a la ciudad extensa. Procesos de urbanización recientes en áreas urbanas españolas articuladas por ciudades medias. *An. Geogr. Univ. Complut. Madr.* **2019**, *39*, 149–175. [CrossRef]
16. Cebrián, F. Ciudades con límites y ciudades sin límites. Manifestaciones de la ciudad difusa en Castilla-La Mancha. *Boletín Asoc. Española Geogr.* **2007**, *43*, 221–240.
17. Naredo, J.M. *La Burbuja Económico-Financiera en la Coyuntura Económica Reciente (1985–1995)*; Siglo XXI: Madrid, Spain, 1996.
18. Roca Cladera, J.; Burns, M.C. The Liberalization of the Land Market in Spain: The 1998 Reform of Urban Planning Legislation. *Eur. Plan. Stud.* **2000**, *8*, 547–564. [CrossRef]
19. Calderón, B.; García, J.L. Legislación urbanística y planeamiento urbano en España, 1998–2015. Del despilfarro a la sostenibilidad. *Scr. Nova—Rev. Electrónica Geogr. Ciencias Soc.* **2017**. Available online: https://revistes.ub.edu/index.php/ScriptaNova/article/view/19429. (accessed on 1 June 2020). [CrossRef]

20. Lobato Becerra, J.A. Notas sobre la obsolescencia de los planes generales: Planificación estratégica y modelo urbano. *Ciudad Territ. Estud. Territ. CyTET* **2020**, *LII*, 197–210.
21. Rullán, O. La planificación urbana y territorial en tiempos de crisis. In *Libro Jubilar en Homenaje al Profesor Antonio Gil Oncina*; Olcina, J., Rico, A., Eds.; Publicaciones de la Universidad de Alicante: Alicante, Spain, 2016; pp. 1267–1286.
22. Ferrer, A.; Solà-Morales, M. El urbanismo municipal en España. *Pap. Regió Metrop. Barc.* **2005**, *43*, 4–108.
23. Law 2/2002 Cites amongst Its Objectives: Working Towards Sustainable Urbanistic Development and the, Always Promised, Simplification of Urbanistic Procedures. The Principles of this Law Are Presented in the Text Included in DL 1/2010, of 3 August (Law 16569/2010), Which Is Still in Force in Catalonia. Available online: https://www.boe.es/buscar/doc.php?id=BOE-A-2010-13883 (accessed on 2 September 2020).
24. Nel.lo, O. El planeamiento territorial en Cataluña. *Cuad. Geográficos* **2010**, *47*, 131–167.
25. Sotoca, A. Urban growth management in Catalonia, 2005–2010. *Urban Res. Pract.* **2016**, *9*, 91–102. [CrossRef]
26. Bellet, C. Proyectos y grandes operaciones urbanas. In *Naturaleza, Territorio y Ciudad en un Mundo Global*; AA.VV. Universidad 574 Autónoma de Madrid y AGE; UAM: Madrid, Spain, 2017; pp. 1249–1265.
27. Burriel, E. La 'década prodigiosa' del urbanismo español (1997-2006). In *Diez Años de Cambios en el Mundo, en la Geografía y en las Ciencias Sociales, 1999–2008. Actas del X Coloquio Internacional de Geocrítica*; AAVV; Universitat de Barcelona: Barcelona, Spain, 2008.
28. Romero, J. Construcción residencial y gobierno del territorio en España. De la burbuja especulativa a la recesión. Causas y consecuencias. *Cuad. Geogr.* **2010**, *47*, 17–46.
29. Gaja Díaz, F. El "tsunami urbanizador" en el litoral mediterráneo. El ciclo de hiperproducción inmobiliaria 1996–2006. *Scr. Nova—Rev. Electrónica Geogr. Cienc. Soc.* **2008**. Available online: http://www.ub.edu/geocrit/sn/sn-270/sn-270-66.htm (accessed on 20 February 2019).
30. del Valle, R.M.G. *La Telaraña Financiera. Una Geografía de la Financiarización y su Crisis*; RiL, Ed.; Instituto de Geografía, Pontificia Universidad Católica de Chile: Santiago de Chile, Chile, 2018.
31. Calderón, B.; García, J.L. La estructura de las ciudades españolas: Un complejo entramado de relaciones entre permanencias y cambios, formas y usos. *Boletín Asoc. Geogr. Española* **2018**, *77*, 283–314. [CrossRef]
32. García-Herrera, L.M. Mercantilización del espacio urbano bajo la lógica neoliberal: Gentrificación y redefinición de los espacios públicos en España. In *Naturaleza, Territorio y Ciudad en un Mundo Global*; AA.VV.; Universidad Autónoma de Madrid y AGE: Madrid, Spain, 2018; pp. 858–877.
33. Romero, J.; Brandis, D.; Melo, C. El giro neoliberal de las políticas para la Ciudad en España. Balance a partir de los casos de Madrid y Valencia. *Boletín Asoc. Geogr. Española* **2015**, *69*, 369–386.
34. Instituto Nacional de Estadística–INE, Padrón Municipal de Habitantes. 2019. Available online: https://www.ine.es/dyngs/INEbase/es/categoria.htm?c=Estadistica_P&cid=1254734710990 (accessed on 20 February 2019).
35. The urban areas that are considered here are those delimited by the *Atlas Estadístico de las Áreas Urbanas del Ministerio de Transportes, Movilidad y Agenda Urbana* (MITMA, 2018). This delimitation tends to include fewer municipalities than that produced for the Urban Audit (Eurostat) and based on Functional Urban Areas (FUA).
36. Institut Cartogràfic i Geològic de Catalunya (IGGC). Available online: https://www.icgc.cat/ (accessed on 20 May 2020).
37. The urban history of Manresa has seen five different Master Plans: The *Plan de Reforma y Ensanche* of 1939, the *Plan General* of 1964, the *Plan General* of 1981, the *Plan General* of 1997 and the current Plan, which dates from 2017.
38. The municipality of Lleida has also had 5 Master Plans: The *Plan de Ensanche* of 1865, the *Plan de Ensanche* of 1925, the *Plan General de Ordenación Urbana* of 1957, the *Plan General Municipal* of 1979 and the *Plan General de Ordenación Urbana* of 1999. Work is currently underway on a new *Plan General* (2015–2020), which was initially passed in 2018.
39. Census of Population, Building and Housing (1981, 1991, 2001 and 2011) and Municipal Population Register of 2019, of the *Instituto Nacional de Estadística*–INE. Available online: https://www.ine.es/ (accessed on 15 April 2020).
40. Information about Non-Current Planning was Consulted in the Archives of Lleida City Council and the Planning Archive of the *Departament de Territori i Sostenibilitat* of the *Generalitat de Catalunya* in Barcelona. Current Planning, as of February 2020, was Consulted via the Platform of the *Registre de Planejament Urbanístic de Catalunya (RPUC)*. Available online: https://dtes.gencat.cat/rpucportal/inici/es/index.html (accessed on 15 February 2020).
41. Llop, C. *Atlas Urbanístic de Lleida 1707–1995*; Ajuntament de Lleida: Lleida, Spain, 1995; p. 107.
42. Ajuntament de Manresa Public Documents Open Access. Available online: https://www.manresa.cat/web/menu/3758-planejament-historic (accessed on 15 February 2020).
43. Llop, J.M.; García Catalá, R. El Plan General Municipal de Ordenación Urbana y Territorial de Lleida, 1995–2015. *Urban* **2007**, *12*, 86.
44. Ferrer, A.; Sabaté, J. Introducció: l'Urbanisme municipal vist pels professionals. *Pap. Rev. Regió Metrop. Barc.* **1999**, *32*, 9–18.
45. Ajuntament de Manresa, *Memoria del Plan General de Manresa, 1997, point 2*. Non edited public planning documentation. Consulted at the central archive of the Departament de *Territori* i Sostenibilitat, Generalitat de Catalunya (Barcelona).
46. Bellet, C.; Alonso, M.P.; Gutiérrez, A. The High-Speed-Train in the Spanish cities: Urban integration and strategies for socioeconomic dynamisation. In *Territorial Implications of High-Speed-Rail. A Spanish Perspective*; Ureña, J.M., Ed.; Ashgate Pub.: Farnham, UK, 2012; pp. 163–196.

47. Lleida 1999 Master Plan. Available online: https://urbanisme.paeria.cat/planejament-i-habitatge/Revisio_del_Pla_general_Ordenacio_Urbana_de_Lleida_1995-2015 (accessed on 22 October 2020).
48. Manresa 1997 Master Plan from *Mapa Urbanístic de Catalunya Departament de Territori i Sostenibilitat* of the *Generalitat de Catalunya*. Public Documentation. Available online: http://dtes.gencat.cat/muc-visor/AppJava/home.do (accessed on 27 December 2016).
49. The Manresa 2017 Master Plan. Public Document. Available online: https://www.manresa.cat/web/article/635-pla-general-de-manresa (accessed on 10 January 2019).
50. The Lleida 2015–2035 Master Plan Proposal. Public Document. Available online: https://poumlleida.paeria.cat/doc_aprov_inicial.html (accessed on 12 February 2019).

urban science

MDPI

Article

Urban Policies and Large Projects in Central City Areas: The Example of Madrid (Spain)

Dolores Brandis García

Department of Geography, Universidad Complutense de Madrid, 28040 Madrid, Spain; dbrandis@ucm.es

Abstract: Since the late 20th century major, European cities have exhibited large projects driven by neoliberal urban planning policies whose aim is to enhance their position on the global market. By locating these projects in central city areas, they also heighten and reinforce their privileged situation within the city as a whole, thus contributing to deepening the centre–periphery rift. The starting point for this study is the significance and scope of large projects in metropolitan cities' urban planning agendas since the final decade of the 20th century. The aim of this article is to demonstrate the correlation between the various opposing conservative and progressive urban policies, and the projects put forward, for the city of Madrid. A study of documentary sources and the strategies deployed by public and private agents are interpreted in the light of a process during which the city has had a succession of alternating governments defending opposing urban development models. This analysis allows us to conclude that the predominant large-scale projects proposed under conservative policies have contributed to deepening the centre–periphery rift appreciated in the city.

Keywords: urban project; urban agents; market urbanism; speculation; urban transformation; central area; Madrid

Citation: García, D.B. Urban Policies and Large Projects in Central City Areas: The Example of Madrid (Spain). *Urban Sci.* **2021**, *5*, 42. https://doi.org/10.3390/urbansci5020042

Academic Editors: Peter Newman and Neil Sipe

Received: 20 February 2021
Accepted: 18 May 2021
Published: 20 May 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the author. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

The framework for this study is the general context that emerged when the economic structure worldwide suffered changes as a consequence of the Fordist crisis and the globalisation of space in the late 1970s and became evident in Spain in the 1990s. In this state of economic re-structuring and territorial competition, nations are adopting neoliberal strategies that are transposed to major cities' urban agendas in order to overcome the financial recession and recover their position in the global economy. In this scenario, urban policies promote strategic projects aiming to enhance the city's position on the global marketplace. Cities review their objectives and modes of operation and drafting strategies of a neoliberal nature to multiply their bonds with economic players. This framework of connections is by which the major urban transformation projects should be viewed, especially those located in the central areas of metropolitan cities from the end of the last century and recognised as one of the more significant signs of the globalisation of cities.

An abundance of literature on this subject appeared from the first decade of the 20th century, and production continues to this day. Studies with greater theoretical weight are perceived to gain substance progressively from other more-specific studies centred on different scales and geographic scenarios, especially those appearing in Europe and Latin America that also incorporate a considerable theoretical background, with both approaches contributing to providing increasing conceptual wealth. From the profuse bibliography available, we have selected samples of the more general contributions [1–8] and those referring to specific geographical areas [9–14] that have helped outline the most significant constants of the urban model underlying large-scale projects in cities. Over the course of this research, we shall also refer to other studies dealing with more specific issues in the city model applied by neoliberal urban policies that use large-scale projects as strategic instruments wielded by the competitive global city they aspire to. Lastly, we cannot fail to point out the interest in studies that, from different perspectives, address some of the

major products undertaken in European and Latin American cities, national capitals or metropolitan agglomerations, which have been fundamental in recognising coincidences and differences with the projects undertaken in Madrid.

This progressive approach to academic literature has served as a foundation for the necessary conceptual premises to confidently address the study at hand, whose aim is to ascertain the degree of correspondence existing between tried and tested urban policies for city development and the large-scale projects proposed. We selected the city of Madrid as a case study because, since the end of last century, the urban policies of a succession of neoliberal conservative governments have promoted large-scale projects. In 2015, a progressive local government challenged these large projects and offered alternative plans.

In this work, we examine the actors and processes linked to the urban policies and models that are put into practice, underscoring the role of public and private agents who promote the projects, the strategies deployed through management models on the land prices produced and the design of the development projects. Moreover, this type of approach is found in many studies focusing on Latin America and Europe during the period studied [14]. Having set forth the premises underpinning this work, we discuss below the key points according to the sense, meaning and scope of major projects in general and those of Madrid in particular.

In this sense, having transposed the policies of neoliberal nature to the urban agendas of major cities in order to enhance their position on the global market, local administrations review their objectives and modes of operation to incorporate new priorities, forms of governance and management models that reveal new relationships among public agents and the private sector [2,15–18]. It is in this context where large-scale projects are promoted as one of the strategies applied under neoliberal urban policies seeking to maximise the city's capacity of attraction and, at the same time, to multiply bonds with financial stakeholders. The new urban policy subordinates city management to the demands of an open and competitive market that requires an operational framework comprising urban deregulation and sufficiently flexible tools to offer opportunities for participation by private financial initiatives. Such an absence of political regulation is a determining factor driving and consolidating alliances between local governments and private interests.

Urban projects are successful when they combine the advantages of normative flexibility with effective management. To this end, local governments expedite the administrative process and issue the relevant authorisations, signing covenants with the private sector, and may even delegate in the latter the definition and execution of their urban master planning schemes. At the same time, they often shirk their democratic duty to all the participation of other urban stakeholders claiming a role in the decision-making process and their right to issue an opinion on the formulation of the projects. For their part, private companies introduce business management formulas guided by efficiency and profitability criteria, substantiated solely on profit expectations [11,19].

In this operational context, large projects are especially undertaken in urban spaces that have gradually gained a more central position, as the more central the location, the more profitable the investment. Governments publicise these projects as drivers of economic progress for the city, thus justifying the need for intervention to improve their urban image [6,7]. Their purpose is the structural reorganisation of the physical and economic fabric of degraded and dysfunctional spaces that are still to be found in cities' central areas. These are commonly enclaves occupied by railway infrastructures, port installations, former industrial sites or military facilities. The objective is to convert these into modern productive and consumption areas through the radical transformation of their urban image, hence the importance given to designers and architects of renown, who impress their hallmark on these new iconic references to the contemporary city.

Most of these transformations are speculative operations with the promise of highly profitable investments stemming from their links to changes in the social standing of space. In their execution, strategies are implemented to promote and intensify real estate value dynamics in order to attract economic activities and social classes that are significant under

globalised capitalism [20]. Such transformations have important effects on land prices and on the real estate market, reinforcing the privileged status of these areas within the city, and contribute to widening the centre–periphery gap from an urbanistic and social viewpoint.

2. Materials and Methods

The purpose of this research is supported firstly on the most relevant literature on the meaning of large-scale urban projects and their links to the urban policies that sustain them, which has allowed us to build a framework of reference for our analysis of large urban projects in Madrid.

Secondly, the eminently empirical nature of this work requires the consultation of imminently quantitative sources for this analysis, which are complex but sufficient for yielding results and interpretations. We distinguish between three types of materials: documentary, hemerographic and manifestations of the social and associative fabric.

The chief protagonism falls on documentation expressing the urban project as an instrument of planning and intervention. Follow-up of such material throughout the process, from the submission of the project to its approval, is indispensable in evaluating its level of compliance with legal requirements (state, regional and local laws) and with current planning schemes (municipal urban master planning schemes and regulations). The analysis of the projects' official documents, their location against current legislation and the applicable urban master planning schemes allows us to interpret the meaning and scope of the claims filed in the courts by other urban players. In this sense, the documentation issued from the judiciary, especially those contained in the rulings of the courts, is viewed as a valuable and essential source as it represents a large part of the unorthodox strategies employed by the principal urban agents involved in formulating the projects. Thus, many of the filed claims refer to breaches of the regional building code and to insufficiently upsubstantiated modifications to the general urban planning scheme. Moreover, the slow-moving process for the resolution of claims, generally through more than one court, explains the delays in the performance of the projects and, in some cases, their coming to a standstill, while also explaining many of the changes made in these projects' formulation during the process.

Among the materials consulted for this work are hemerographic sources. These include those providing opinions by urbanism professionals who make use of the media to reduce the time required for publication in academic journals. These opinions of renowned experts add elements of judgement that help clarify the issues dealt with herein. Another type of those is found in research journalism whose function is to disseminate to the public information on current issues that are difficult to access. It is, however, necessary that these news items refer to the original source as a means of differentiating them from other opportunistic and biased articles.

Lastly, this work also examines the ways in which different social groups speak out against the formulation of the projects. The manifestations of these groups, whether informal, grassroots or more regulated bodies, provide an important element of reflection, as they portray opinions stemming from the experience and expectations of their members. These groups may bring actions before the courts of justice and demand their rights to participate in the negotiations with the administration for drafting the projects, in order to attenuate their negative effects in social, environmental and urban terms.

3. Results

Since the late 20th century, large urban projects have been undertaken in Spain with noticeable territorial and social consequences, especially in urban and metropolitan areas. These operations reflect the neoliberal urban model incorporated in the urban agendas of conservative governments. It has been corroborated that the deployment of large-scale projects has generated enclaves of a formal logic and independent management that deepen the social and economic segregation of lower-income groups obliged to move their homes

to the increasingly distant outskirts and close down their traditional activities in downtown spaces [21,22].

To this rising social inequality, increased during the period of economic expansion, is added the imposition of austerity measures and the absence of the right to decent housing. Citizens' unrest is channelled through left-wing proposals claiming social urban planning and calling for a change in policy making [23]. They place the focus on fundamental concepts such as democratic regeneration, pacts, coordination, cooperation, the struggle against corruption, transparency, participation, inclusion, social justice and public ethos, which represent their rejection of a political and economic regime in crisis [24]. Citizens' indifference towards the dominant urban policy was manifested after the 2015 elections. Many cities and municipalities would be governed by political formations emerging from social movements and would question the urban agendas of recent decades [25,26].

In Spain, Madrid exemplifies the most consummate version of the neoliberal model imposed on the administration of a city since the last decade of the 20th century [27]. It is also one of the most significant in responding to the crisis with far-reaching rallies that would bring to power a progressive municipal government until 2020, when the city returned to a conservative political formation [28,29].

It is important to keep in mind the sequence of the successive municipal and regional governments to easily understand the correspondence between urban policies and models throughout the period studied. In this vein, the socialist municipal government (1979–1989) was succeeded by Centro Democrático y Social (1989–1991), Partido Popular (1991–2015), the left-wing coalition Ahora Madrid (2015–2019) and the coalition Partido Popular/Ciudadanos to the present. In the Autonomous Community of Madrid, the socialist government (1983–1995) was succeeded by Partido Popular (1995–2019) and Partido Popular/Ciudadanos (from 2019).

3.1. Urban Policies and Large-Scale Projects Undertaken in Downtown Madrid

The 1990s witnessed a political swerve in Madrid towards conservative administrations at both municipal and regional government levels that remained in power without interruption for the next 25 years and carried out a number of large-scale urban projects in the central area of the city, adhering strictly to the neoliberal model. During this period a political–financial–entrepreneurial bloc was consolidated, which was to play a key role in the evolution of the city and the region of Madrid as a whole. Other factors concurred that were favourable for the urban model adopted. The huge array of fiscal and budgetary competences assumed by the regional government and the incorporation of Madrid to the financial and economic globalisation context were fundamental in this regard. From an urban planning viewpoint, the cornerstone was the Plan General de Ordenación Urbana—PGOU (general urban planning scheme) of 1997; thanks to which, an active urban and normative easing policy was implemented with the aim of achieving a more efficient process for producing housing and industrial facilities [8,30,31].

In this framework, major urban projects were promoted in the city's central area enclosed by the M-30 ring road. Since the mid-1990s, financial and business real estate income within the central area enclosed by the M-30 ring road has gradually accumulated around the north–south axis of the Paseo de la Castellana. This axis extended northward with landmarks such as the AZCA complex in the 1960s and Torres Kio in the 1980s. This trend further increased thanks to urban deregulation and the dismantling of planning instruments in the PGOU of 1997, at which point Madrid's urban planning process assigned its regulatory capacity to the financial and land market.

On the borders of Madrid's central area, there was still space for transformation projects in line with the new local urban agenda. These enclaves were originally on the periphery of the centre, an attribute they retain in part to this day. The aim is to accommodate these enclaves to the central status gained by the area. The neoliberal urban model facilitated their transformation through urban projects supported by the collaboration between public and private agents.

As examples of this type of intervention, we give a brief description of the three recent operations formulated in the city's central area. Two of these are located on the northern extension of the Castellana thoroughfare: Cuatro Torres and Madrid Nuevo Norte. The third of these, the Mahou-Calderón operation, is far from the mentioned axis, on the southeastern border of the central area but nonetheless supports the central status of the area (Figure 1). The Cuatro Torres project has been completed and exemplifies the neoliberal model. Madrid Nuevo Norte has received approval but has not been executed, and Nuevo Mahou-Calderón is currently being built. The last two projects that were paralysed during the progressive municipal government of 2015 invite recognition of the alternatives proposed by the progressive government of Ahora Madrid [32].

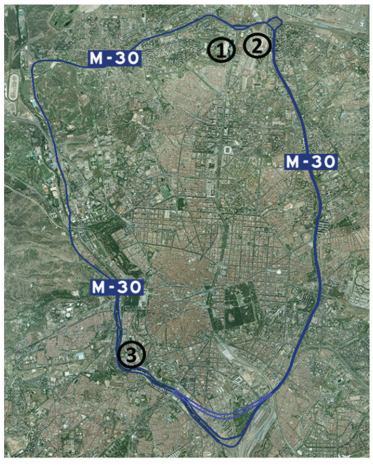


Figure 1. Recent large-scale projects in Madrid city centre 1. Cuatro Torres; 2. Madrid Nuevo Norte; and 3. Nuevo Mahou-Calderón (source: the author).

The results of this analysis highlight the role played by public and private agents that promote these projects within urban models supported by the successive local governments during the duration of the process. In this line, we shall endeavour to demonstrate that projects are formulated when so decided by the agents willing to take part and benefit from the most favourable conditions, who deploy strategies to obtain modifications to land planning schemes and legislation, subscribe covenants and decide alterations to the formulation of projects. All of this pursues the aim of establishing the necessary conditions to allow private entrepreneurs and large investors to extract the maximum profitability from the transformation. We also examine the legal actions brought by aggrieved citizens' associations who question the social quality of the projects. Finally, it is also necessary to determine the identity of the new owners of the land who would perform the material execution of these projects, thus adding evidence to the appraisal of the central area.

The casuistry accompanying each project, as well as the particular characteristics they present (surface area, type of developer, urban planning parameters, design, etc.), likewise makes individual analyses advisable. Thus, the issues addressed can be outlined more clearly and adequately when incorporated to the general premises for this study.

3.2. The Cuatro Torres Project

The Cuatro Torres skyscrapers stand on the grounds occupied since 1963 by the Real Madrid football club sports complex on 14 ha of land on the northern extension of La Castellana, expropriated by the City Council and sold to the Club. At the time, the press discussed the Club's early attempts to modify the urban provisions of the PGOU of 1963 to include lucrative land uses, as well as the former landowners' intention to demand the

restitution of the property, or an indemnification, in the event that authorisation should be given to works not exclusively dedicated to sports activities.

By the end of the 1990s, stakeholders wishing to transform the sports city grounds had begun to prepare the necessary conditions to achieve this goal. As a first step, the Community of Madrid and the City Council purchased three hectares of land from the football club in 1996 with the goal of enlarging the system of public facilities in the area. Second, in 2001, all three owners concluded an agreement to boost Madrid's candidacy for hosting the 2012 Olympic Games [33]. A third step involved modifying the 1997 PGOU and re-classifying the Real Madrid premises for tertiary use with a buildable floor area of 225,000 m^2, and an Olympic sports hall was planned on the public land. Political groups in opposition and the citizen's platform "Contra las Torres del Nudo Norte" spoke out against these actions to no avail. The transformation of private land, the *Cuatro* Torres project, was performed in record time and completed in 2009.

The enclave was thus consolidated as the city's leading business complex and international trading centre. The towers, ranging from 49 to 56 storeys high, dominate the *Madrid skyline* (Figure 2).

Figure 2. View of Cuatro Torres from the northern Paseo de la Castellana [34]. Copyright 2008 Eurostarshoteles.

Of this skyscraper complex, Real Madrid was entitled to two complete buildings and more than one half of a third, which it shares with the Community of Madrid, while the fourth building was awarded to the City Council. The operation yielded multi-million capital gains for all three landowners. The floor space in the future high-rise buildings was sold to important companies in the leading economic sectors, who brought in world-class architects to design their facilities. Torre Espacio was purchased by the real estate developer Espacio (OHL group) and designed by Henry N. Coob. Torre Cepsa was acquired by the Caja Madrid financial corporation and built by Norman Foster. Torre Cristal, shared by the club and the Community of Madrid, was purchased by the insurance company Mutua Madrileña who commissioned the project to César Pelli. The City Council sold its rights to Torre PWC, built by Carlos Rubio Carvajal and Enrique Álvarez Sala, and to the construction firm and developer Sacyr. Over time, with the exception of Torre Cristal which has remained the property of its original owner, the buildings have changed hands: Torre Espacio now belongs to the Philippine group Emperador, Torre Cepsa to the Pontegadea group, and Torre PWC to the real estate investment trust (REIT) Merlin Properties.

A fifth tower, Torre Caleido, is currently under construction on the community services land that was left undeveloped. In 2015, the City Council leased this land for 75 years to the Villar Mir industrial and real estate group and the Philippine company Emperador. This 36 storey building is the design of Fenwich & Iribarren Architects and is set to house a university campus dedicated to health-related studies, as well as a spacious shopping and leisure complex.

The impact of the Cuatro Torres development will reach beyond the central area, affecting the northeastern periphery of the city. The agreement signed in 2001 stipulated that the City Council would build a new sports complex for the Real Madrid football club on land in Valdebebas, near Barajas airport, previously earmarked for an airport complex. The land was obtained after the City Council accepted its owners' demands for a major part of the envisaged 'airport city' to be re-classified from tertiary to residential use. However, the favours granted to the club did not end here: before the new plan for Valdebebas was approved, permission was irregularly given in 2006 for the first phase of the construction of the sports complex.

3.3. The Madrid Nuevo Norte Project

The project is located on the northern extension to the Castellana thoroughfare and originates from the Chamartín operation formulated 26 years ago, but its material transformation has not yet begun. As this was a lengthy process drawn out over a very long period of time, the developers have designed six different projects in which the surface area, buildability ratios and the envisaged number of dwellings have all undergone changes [35]. Given that this undertaking featured the State Administration as landowner, we should bear in mind the political nature of the succession of central governments: PSOE (1982–1996), PP (1996–2004), PSOE (2004–2011), PP (2011–2018) and PSOE/Unidas Podemos (since 2019).

This project was promoted by Red Nacional de Ferrocarriles Españoles (Renfe) in 1992 with the aim of modernising the railway facilities at Chamartín station. Renfe issued a call for tenders to procure financing. The awardees were the public bank Argentaria and the San José construction company, who formed the society Desarrollos Urbanísticos de Chamartín (DUCH), participated by Argentaria with 72.5%. This project was defined in 1995 as *Operación Chamartín* on 62 ha property of Renfe, with a gross floor-space ratio of 0.6 m^2/m^2 and plans to build 5000 homes.

Over subsequent years, major changes were made to the premises inherent to this operation, formulated by neoliberal central, regional and local governments in power. The necessary provisions were lined up to make the urban development operation viable; at which point, it took on greater importance. First, DUCH and Renfe created a consortium and signed a new contract to adapt the undertaking to the new developers' interests. Second, Argentaria was privatised through a merger with Banco Bilbao Vizcaya (BBVA). Third, spot changes were made in the PGOU to allow the desired urban transformation of the space. Moreover, three successive projects were designed in which the surface area of the initial operation of 1995 is multiplied five-fold and the gross buildable space is doubled.

These three projects were presented in 1997, 2011 and 2015 during the mandates of a conservative central government, save for the socialist parentheses in which only the first project was stopped for study by the new officials at the Ministry of Development and Renfe.

The first *Prolongación de la Castellana* project was designed in 1997 over a large area (305.7 ha), with no changes to gross buildable area (0.6 m^2/m^2) but with a very large commercial floor area (550,206 m^2). The 2011 project, likewise entitled *Prolongación de la Castellana*, further enlarged the previous project's parameters: surface area (312.5 ha), gross buildable area (1.05 m^2/m^2) and commercial floor area (1,204,541 m^2). In addition, a total of 17,320 dwellings were planned, of which 22.5% would be social housing. These major changes required the modification of both the PGOU and the *Ley del Suelo Regional* [regional land-use act], in this case to allow the street-level area covering the rail yard at the station to be computed in the overall eligible surface area.

Citizen associations and urban planning professionals denounced the operation on the grounds of the excessive terrain covered, its excessive commercial floor area and the insufficient allowance for protected housing. As a consequence, in 2013, the Higher Court of Justice of Madrid (TSJM) paralysed the operation after revoking the selective modification to the PGOU, which should have been processed as a revision of the general plan rather

than a minor alteration and for infringing the 2007 Land-Use Act, which prohibited the construction of buildings exceeding four storeys in height on urban soil [36]. Nevertheless, this height limitation was solved by the regional government with an additional provision to the Ley de Patrimonio Histórico (historical heritage act) and a modification to the Land-Use Act to remove the height restriction. Judicial rulings obliged the developers to review the planning and reduce the dimensions of the project, while its viability was likewise threatened under the adverse economic circumstances nationwide.

Consequently, Renfe and DUCH concluded a new contract and in 2015 presented the project *Distrito Castellana Norte*, the name adopted henceforth by the developer (DCN). However, the new project's parameters proved even more excessive than before. It only slightly diminished the surface area covered (311.4 ha) while maintaining the gross floor space ratio unchanged (1.05 m^2/m^2). In addition, to conform to the envisaged drop in the demand for office space, it reduced tertiary building potential (1,045,631 m^2) while increasing the number of homes to 17,739, of which only 10% would be social housing. The City Council, however, did not manage to give its final approval to this operation before the municipal elections of 2015 were won by the coalition of left-wing parties Ahora Madrid.

The new municipal government cancelled the operation and launched a participative process open to the city's representative organisations and professionals in the fields of urbanism, ecology and transports. In 2016, it proposed the alternative project *Madrid Puerta Norte*, which it planned to lead single-handedly. This project cut back its extension (174.5 ha), reducing gross buildable space (0.7 m^2/m^2) and tertiary buildable area (582,275 m^2). Similarly, housing was reduced to 4587 units, of which 22% would be protected homes. As a new feature, it divided the location into four sectors subject to different modes of management, buildable space potential and housing density, doing away with the operation's previous unitary concept. The project was approved by the associations and citizens' groups that took part in drafting it.

Nevertheless, the proposal was rejected by DCN, and negotiations were taken up with the City Council to unblock the situation. In 2018, the developers tabled the new *Madrid Nuevo Norte* project that caused indignation among social groups. This operation's parameters were greater than any previous projects. The surface area of the plot (329 ha) was the largest up until then, and the total tertiary buildable area (1,505,659 m^2) was also the highest. Although the four zones were maintained, gross buildability was established from 0.7 to 1.05, according to each zone. More housing was incorporated (10,510), of which 38% would be social homes.

Political groups, citizens' associations, neighbourhood associations under the Zona Norte platform, non-governmental and professional urban planning organisations denounced the project, criticising its approval by a progressive municipal government. These groups demanded the cancellation of the operation on the grounds that it was blatantly speculative and kowtowing to interests of BBVA, as well as deepening the north–south socioeconomic inequality rift in the city. They urged the City Council to declare the grounds public property dedicated to social uses in order to ensure a sustainable balanced and fair development.

After the municipal elections in 2019, a conservative coalition came to power in the City Council and gave final approval to the project in 2020 [37] (Figure 3). Political groups in the opposition, however, called for the operation to be cancelled demanding that Adif (formerly Renfe) should make public all the documents related to the development hidden from public opinion. Deeming the project illegal, they filed a number of claims in the courts and brought action before the Fiscalía Anticorrupción (anti-corruption prosecutor's office) against 28 policy makers and business leaders for alleged administrative prevarication, bribery and embezzling of public funds through contracts over a 25 year span. In the same way, the former owners of the expropriated land are still suing for their rights in the courts, after they learned of the incorporation of lucrative uses. All these claims remain unresolved today.

Figure 3. Recreation of the Madrid Nuevo Norte project (2020) [38]. Copyright 2020 DCN Madrid.

3.4. The Nuevo Mahou-Calderón Project

Prior to presenting the result of examining the project, it seems advisable to make a brief introduction of the territorial context in which this operation in planned, to the south of Madrid's central area, distant from the Castellana thoroughfare business district, unlike the two foregoing projects. This space began as an industrial quarter in the second half of the 19th century, consisting of factories, services to the city and workers' homes, and was conditioned by the earlier existence of the rail ring infrastructure, crossing the district from east to west. In the mid-1990s, in the early inner-city de-industrialisation period, the first factories were dismantled as a consequence of the developmental PGOU of 1963. These industrial voids were replaced with residential complexes that gradually raised the real estate value of the district generating expectations of lucrative activities. The PGOU of 1985, which advocated for the recovery of the city rather than its growth, attempted to ban speculative manoeuvres associated with industrial abandonment. However, the economic recovery at the end of that decade caused the urban market to prevail in this increasingly central space.

Two urban planning operations were promoted that hastened the transformation of the city sector south of the central area. The first of these, the *Pasillo Verde Ferroviario* (green railway corridor) was designed in 1987 by a consortium comprising Renfe and the socialist City Council. The purpose was to eliminate the rail ring line and to improve the district's environmental quality. The undertaking envisaged sinking the 8 km rail line and adapting it to passenger traffic, covering it with a green surface-level pedestrian path and leisure spaces and facilities. To pay for these works, the remaining railway grounds were re-classified for tertiary uses and put up for sale. However, the original plan underwent modifications in 1992 by the conservative municipal government taking up office, considerably increasing its residential development potential and reducing community and rail facilities [39]. The second operation *Madrid Río* was developed by the City Council in 2006. This intervention included reforming and sinking the M-30 urban ring road that follows the course of the River Manzanares on the south-west, delimiting the southern border of the central area. The operation aimed to improve the environmental quality of peripheral districts and boost their connectivity, besides creating a new public space with green zones, with room for leisure and sports facilities for all residents and citizens of the metropolitan area [40]. The works ended in 2012, although a section remains unfinished in the proximity of the Mahou-Calderón location.

In the next section, we present the results of the Nuevo Mahou Calderón project, currently in construction. This covers a surface area of 19.3 ha originally occupied by the Vicente Calderón football stadium, property of the Atlético de Madrid football club and the Mahou brewery. Both were erected in the early 1960s on empty plots near the River Manzanares. Throughout the urban development process, which began in 2009 and ended

in 2017, two successive projects were tabled, ascribed to the conservative and progressive municipal governments of before and after 2015.

Among the circumstances surrounding the operation, it cannot be overlooked that it was related throughout to the former track and field stadium known as La Peineta, where the Wanda Metropolitano stands today. La Peineta stadium was built in 1994 by the socialist regional government for its unsuccessful candidacy to host the 1997 World Athletics Championships. The argument associating it with the transformation of the Mahou-Calderón site began with the regional government's assignment of La Peineta to the City Council and with the agreement signed in 2008 by the City Council and the Football Club for the latter to purchase La Peineta and build a new stadium to replace it in anticipation of the 2012 Olympic candidacy.

The urban development for this operation issued by the conservative government and entitled *Mahou-Vicente Calderón* was promoted by the owners of this stretch of land, namely the football club and the brewery. The club thereupon demanded the same treatment received by the Real Madrid football club for its transfer from Castellana to Valdebebas. This required exceptional modifications to the PGOU to re-qualify as residential the industrial and sports land granting it a gross floor space ratio of 1.49 m^2/m^2. Neighbourhood associations and citizen groups denounced the high-rise buildings resulting from the excessive buildable floor space granted. The TSJM annulled the modification on the grounds of its infringement of the regulations set forth in the 2007 regional land-use law (Ley Regional del Suelo), which prohibits building more than four storeys [41]. The owners appealed this decision before the Supreme Court and, before a ruling was passed down, the Partial Plan was approved defining the urban planning rules for the area, and in 2014, the promoters designed a project in which the gross floor-space ratio was reduced to 1.0 m^2/m^2 but the typology of residential buildings for 2000 dwellings was maintained as towers and blocks.

The Rubio & Álvarez-Sala studio of architects designed the project including 36-floor skyscrapers, 20-storey buildings and 8-floor residential blocks (Figure 4). The City Council publicised the timelines and the quality of the operation stressing its economic, social and environmental profitability, and for its contribution to creating a monumental, iconic residential area that would become a reference in Madrid, and named it *La Nueva Puerta del Sur*. Political parties in the opposition and the Contra el Plan Mahou-Calderón platform demanded its withdrawal, as it was approved without a legal settlement in the courts, and staged demonstrations to express their rejection: "No to the Mahou-Calderón operation. No to this policy of speculation!" and "This is no game; Arganzuela is not Manhattan!"

Figure 4. Recreation of the *Mahou-Vicente Calderón* project (2014) [42]. Copyright 2014 Laura Sánchez Carrasco and Rubio Arquitectura.

However, the sale of the municipal La Peineta stadium, necessary for relocating the Atlético football club still remained unresolved. Therefore, the PGOU was modified and the land re-classified for private sports uses. This move was denounced before the TSJM by the Señales de Humo association, composed of Atlético football team followers who were

critical of the club's management. Before the legal resolution was handed down, La Peineta was demolished in 2011, and the new Wanda Metropolitano stadium was completed in 2019. Although the court ruling was issued in 2018, declaring null and void the modification to the PGOU for giving priority to private interests over the general interest, the promoters appealed before the Supreme Court, which finally ruled in favour of the modification, finding it in keeping with legal provisions, thus affording legal certainty to the purchase of La Peineta and to the new stadium.

The arrival of the progressive platform Ahora Madrid in 2015 to the municipal government marked a new stage in the development of the Mahou-Calderón operation, as all major urban transformation projects pending in the city for re-assessment were halted. The Mahou-Calderón operation was taken back to the drawing-board for re-assessment and negotiation with all urban players, including citizens' groups, to design a new project on a scale compatible with the surroundings and with a smaller number of housing units. The progressive municipal council was supported by the rulings of the courts declaring null and void the modification to the PGOU and the Partial Plan. The City Council, however, was faced with a legacy of obstacles that would condition to a large extent its urban planning proposal. It was unable to evade the commitments made in the agreement signed in 2008 to approve the operation as soon as possible, as otherwise the club would be entitled to a multimillion-euro indemnity. It also had to accept that the club should receive sufficient capital gains to compensate for the expenses of the Wanda Metropolitano stadium [43].

The *Nuevo Mahou-Calderón* project was drafted in record time. The landowners accepted the design with no skyscrapers and a smaller housing allowance. This gave rise to the process for a further modification to the PGOU and a new Partial Plan. The City Council conducted a restricted call for bids from urban planning professionals to address a new distribution of the area that was awarded to the architects Enrique Bardají y Asociados S.L. This new proposal was presented at the negotiation table made up of citizens' groups, professional associations of architects and engineers, and political parties with municipal representation. The new urban players criticised the high floor-space ratio agreed between the owners and the council, as this undermined the effectiveness and adequacy of the participative process. Nevertheless, they acknowledged the improvements made and proposed, among other measures, spreading the buildable space to balance the height of buildings, enhancing aesthetic aspects and ensuring better sunlight exposure conditions [44,45]. These demands where included in the report given final approval by the regional government [46] and in the applicable urban regulations (Figure 5).

Figure 5. Buildings recreated in the *Nuevo Mahou-Calderón* proposal (2017) [47]. Copyright 2017 E.BARDAJI Y ASOCIADOS/ARQUITECTOS.

The project proposed by the City Council contained significant differences from the project put forward by the promoters in 2014: the surface area was 5.2% smaller; building heights where limited to dimensions similar to those in the surrounding areas with the exception of a number of architectural landmarks; the gross floor-space ratio was reduced to 0.76 m^2/m^2; the commercial floor space dropped by 16%; non-subsidised housing was

reduced by 34.7%, and 11.2% would be under a protection regime; the extension dedicated to community facilities was enlarged by 34.7% and green zones by 41.1%. The responsibility to provide a solution for the M-30 ring road was transferred from private developers to the City Council (Table 1).

Table 1. Principal urbanism parameters in the projects of 2014 and 2017 (source: the author from [48]).

Parameters	2014 Project	2017 Project
Surface area (m^2)	204,216	193,632
Architectural design	36 storey skyscrapers, 22 storey towers and 8 storey blocks	Closed 8 storey blocks; exceptionally, 12 storey buildings
Gross floor space ratio (m^2/m^2)	1.0	0.76
Commercial floor space (m^2)	175,365	147,050
Housing (number)	2000 free disposition	1173 free disposition and 132 protected
Community facilities (m^2)	22,115	29,791
Green zones (m^2)	54,675	77,142
Solution for the tranche of M-30	Ring road re-directed underground by promoters	Covered at street level by the City Council

In 2019, the executive phase of the project commenced with the approval of land re-parcelling. Two plots correspond to the City Council by virtue of compulsory assignments, another four are destined to community facilities and green zones and the remaining six were put up for sale by the landowners. Real estate operations, investment funds and REITs were keen to acquire plots from one of the few pools of land for sale within the central area, a rare opportunity for investors. The plots were acquired by: the real estate management and promotion firm Ibosa; the American GreenOak investment fund; the Spanish real estate corporation Pryconsa; Vivenio, the Dutch APG fund's REIT and Renta Corporación; and the investment fund Azora in association with the building company CBRE GIP.

The new owners of the plots set to marketing near future real estate products without delay. Sales promotions targeted up-market buyers and incorporated an abundance of private facilities. Real estate experts claim that offering quality and high-class common spaces has become equal in importance to location, and the Mahou-Calderón development meets both of these conditions. The average price of the homes advertised before the Covid-19 pandemic was close to 5000 euros/m^2, similar to the most sought-after central districts (Salamanca, Chamberí and Centro). Promoters estimate that this may reach 6000 euros/m^2, given the scarcity of new construction products in the central area of Madrid.

The expectations generated by this operation have caused the upward re-valuation of this area and prompted a significant rise in the price of second-hand housing and the rentals market in the surrounding areas. Shortly, this will also lead to fewer neighbourhood retail businesses, as the commercial surface Carrefour is planning to open on one of the plots.

At present, the developers are asking the City Council for agreements to simultaneously execute urbanisation and construction works so that housing units may be built as soon as possible. Likewise, in 2020, the regional government reformed the Ley del Suelo, replacing the process of applying for new construction licenses and habitation certificates with declarations of responsibility by promoters and architects, thus reducing processing time. It had been foreseen to include this modification in the future *Ley del Suelo*, but the regional government decided to act sooner to drive and reactivate the productive fabric damaged by COVID-19. However, in early 2021, the opposition parties appealed

before the Constitutional Court to invalidate this legislative initiative, claiming that it was approved illegally.

4. Discussion

In the light of our analysis of the large-scale urban projects in the central area of Madrid, in this section, we pose a number of questions for discussion that we endeavour to answer as concisely as possible.

These questions are closely related to the issues implied in the title of this work: firstly, on the relationships between urban policies and the significance and characteristics of large-scale projects in the central areas of cities since the last century; and secondly, whether the analysis of the projects undertaken in the city of Madrid discloses the mentioned relationship, in which case we are obliged to consider the various urban policies enacted by the succession of conservative and progressive local governments over the period studied.

In the first more general section, the following questions may be asked:

1. Do the large-scale urban projects undertaken in the central areas of cities since the end of last century respond to urban policies of a neoliberal nature?

The abundant academic literature highlights that the effects of economic restructuring and the globalisation of space are the most general factors that explain the proliferation of large-scale urban projects aiming to enhance the city's position on the global market. The way to achieve this is to consider the city as an open and competitive market on which economic agents operate with the maximum freedom. This requires the adoption of neoliberal urban policies that subordinate city management to the demands of private operators.

2. Do the large projects undertaken in central areas adhere to the same model or are there key features by which to differentiate them?

Here, the location and purpose of the project play a fundamental and decisive role, displacing project size as an exclusive indicator. Thus, large residential, production, cultural or administrative operations located on the city's periphery, or newly formed central spaces distant from the consolidated urban fabric, are dismissed. Within the central areas, the appropriate location determines the purpose of the projects undertaken and determines the behaviour of urban agents involved throughout the process, and the materialisation and functions they acquire, implying differential characteristics.

3. Can practices be recognised in the large urban projects in the central areas of cities that respond to the specific interests of public or private urban agents?

The neoliberal urban model is designed to satisfy stakeholders in large-scale projects. It satisfies public agents because these urban operations carry a high symbolic value that strengthens their position in political power when advertised as drivers of progress within the city and improving its urban image. Private stakeholders are also satisfied because these projects offer great expectations of financial profit. These agents therefore establish alliances for their mutual benefit. Thus, urban agendas incorporate new priorities including the production of large-scale projects, facilitating the necessary planning and management instruments for private operators and large investors to carry them out.

In the section on the results of analysing the large urban development projects in Madrid, the following questions arise:

1. Have the chosen sources served to reveal the practices derived from the urban policies of the succession of administrations governing the city?

The first point to mention is the constant scarcity and lack of transparency in the documentation required throughout the planning process for the large-scale projects proposed by the neoliberal conservative governments. By contrast, the progressive government adopted democratic forms of participation in the process and in exposure to public opinion. Moreover, the claims filed by urban players directly or indirectly affected and the decisions passed down by the courts of justice consulted in this study have allowed us to determine the strategies implemented by the promoters. Lastly, hemerographic sources have provided access to updated information throughout the process.

2. Did the occupied enclaves and the ownership of the land present characteristics that can be recognised in the performance of the neoliberal urban model driving the projects?

This is certain. These are urban projects located on spaces within the city that, over time, have become central. Originally, these enclaves were occupied by obsolete sports facilities or industrial installations, relegated today to the outskirts: the Real Madrid football club's 'sports city' (Cuatro Torres project), the Atlético de Madrid football stadium and the brewery (Nuevo Mahou Calderón project) and disused railway infrastructures at the Chamartín station and their northern extension (Madrid Nuevo Norte project). With regard to land ownership, the first two locations belonged to highly renowned social institutions and an industry of nationwide prestige. The third enclave is property of the State who established alliances with the financial and real estate sectors.

3. Have the urban projects been planned according to formal and functional standards encompassing them within a single model?

The aim of converting the transformed spaces into modern production and consumption centres, and the obligation to satisfy the economic expectations of private investors, condition the formal characteristics of these projects. This is why the buildability parameter is of such importance, since a higher ratio allows a greater business volume and taller buildings ensure the necessary capacity. In the assigned land uses, lucrative purposes prevail: offices and hotel (Cuatro Torres), quality homes (Nuevo Mahou Calderón) and a combination of both (Madrid Nuevo Norte). In the latter case, the lucrative uses assigned to private investors share space with railway uses. Additionally, the morphology of these projects includes tall buildings whose architecture is designed to stand out for their innovativeness and quality.

4. Do the effects of large-scale projects impinge on their immediate surroundings or the city as a whole?

It is still too early to assess the effects that may become general in the immediate surroundings or throughout the city. It is difficult to confirm these impacts given the different phases each project is presently undergoing (Cuatro Torres, completed; Nuevo Mahou Calderón, in progress; and Madrid Nuevo Norte, not commenced), and also the consequences of the 2008 real estate crisis and the current pandemic in 2021 that have slowed down building activity throughout the capital. Nevertheless, we may mention some observations gained through the fieldwork conducted in the immediate surroundings that are a consequence of the rise in land prices experienced before, during and after the execution of these projects. The rise in land prices is determined by the refurbishment of residential buildings with the goal of increasing the purchase or rental prices of homes, and in the closure of traditional retail businesses as a consequence of rising rental prices. Regarding the effects produced without the central area, the projects undertaken certainly do not contribute to reduce, from an urban planning and social perspective, the centre–periphery divide that characterises the city of Madrid.

5. Conclusions

It is a fact that major urban projects located within cities' central areas are fundamental in conveying an image of status and power of the economic and political elites, but it is likewise true that they become elements that contribute to increasing social inequalities, reinforce urban segregation processes and contribute to deepening the centre–periphery rift.

Similarly, it is confirmed that these actions are identified with neoliberal urban policies and may sideline democratic decision-making mechanisms. This line of action is corroborated when public powers create an institutional framework, presumed to fully guarantee free market practices, and speed up the implementation of major urban interventions by means of public–private collaboration strategies with the aim of concentrating economic profits into a few hands rather than disseminating them throughout the urban setting.

We believe that this study is an empirical contribution to knowledge since Madrid presents one of the most elaborate versions of the neoliberal model embraced by urban policies since the final decade of the 20th century. It demonstrates an urban planning model

based on collaboration among public agents—represented by the central, regional or local governments—and private entrepreneurs. It exemplifies an urban policy that places the economic profitability of private interests before the general good, favouring speculative practices in enclaves that ensure highly profitable real estate benefits to investors, while at the same time propitiating an institutional framework to support the necessary instruments and mechanisms to serve private interests. In essence, it is a model that adds the political opportunities of the former to the business advantages of the latter.

The article likewise recounts the attempts made by the progressive local government in 2015 to change the model, and the inherited obstacles making it impossible to bring in new, more equitable and citizen-oriented forms of governing the city. It also unveils how the return of a conservative government in 2019 reproduced the previous neoliberal principles, disregarding the growing social inequality.

The findings of this study confirm the suitability of the documentary sources consulted in monitoring the process for interpreting the postulates and development of urban projects and of the role played by the various players involved. In this sense, the aim of this paper, i.e., to confirm the correspondence between counterposed urban policies for city development and the projects proposed for the central area of Madrid over recent years, has been accomplished. Lastly, it goes without saying that the invariable modus operandi of neoliberal urban agendas and their contribution to the centre–periphery divide are likewise evinced.

Having shown the urbanistic-speculative nature of these undertakings that tend to deepen inequality in the city and having regard to their imminent execution, it would be advisable to call on the public powers to, at least, consider redirecting the capital gains generated in the operation towards covering the needs of citizens in general.

To finish, we quote the words addressed by architect Enrique Bardají to experts in urban planning practices, deeming them very appropriate for the managers and politicians who, to all effects and purposes, carry the greatest responsibility for the state in which we suffer in our cities:

When public opinion still views urban planning as a set of highly complex and obscure processes, there is something that we urban planning professionals are doing wrong. We should strive somehow toward achieving that the transformation of the city is viewed as a normal process, a NOBLE activity resulting from wisdom and reflection, the criteria of democratically chosen majorities, respectful of minorities, comprehensible laws and total procedural transparency [49] (p. 28).

Funding: This research received no external funding.

Data Availability Statement: Data available in a publicly accessible repository.

Conflicts of Interest: The author declares no conflict of interest.

References

1. Carmona, M.; Burgeess, R. *Strategic Planning & Urban Projects*; Delft University Press: Delft, The Netherlands, 2001.
2. Harvey, D. *The New Imperialism*; Oxford University Press: Oxford, UK, 2003; ISBN 978-0199278084.
3. Altshuler, A.; Luberoff, D. *Megaprojects: The Changing Politics of Urban Public Investment*; Brookings Institution Press: Washington, DC, USA, 2003.
4. Lungo, M. Grandes proyectos urbanos. Una visión general. *Urbana* **2005**, *37*, 15–43.
5. Lungo, M. Globalización, grandes proyectos y privatización de la gestión urbana. *Estud. Centroam.* **2005**, *678*, 367–378.
6. Díaz Orueta, F.; Fainstein, S. The new megaprojects: Genesis and impacts. *Int. J. Urban Reg. Res.* **2008**, *32*, 759–767. [CrossRef]
7. Del Cerro Santamaría, G. Introduction. In *Urban Megaprojects. A Worldwide View*; Del Cerro, G., Ed.; Emerald Group Publishing Limited: Bingley, UK, 2013.
8. Brenner, N.; Peck, J.; Theodore, N. Urbanismo neoliberal. La ciudad y el imperio de los mercados. In *El mercado Contra la Ciudad. Globalización, Gentrificación y Políticas Urbanas*; de Madrid, O.M., Ed.; Traficantes de Sueños: Madrid, Spain, 2015; pp. 211–244.
9. Swyngedouw, E.; Mourlaet, F.; Rodriguez, A. Neoliberal Urbanization in Europe. Langue-Scale Urban Development Proyects and The New Urban Policy. *Antípoda* **2002**, *34*, 542–577.
10. Mourlaet, F.; Rodriguez, A. *The Globalized City: Economic Restructuring and Social Polarization in European Cities*; Oxford University Press: Oxford, UK, 2003; ISBN 9780199260409.

11. Lungo, M.; Smolka, M. Land Value and Large Urban Projects: The Latin American Experience. *Land Lines* **2005**, *17*, 3–6.
12. Cuenya, B. Grandes proyectos urbanos latinoamericanos. Aportes para su conceptualización y gestión desde la perspectiva del gobierno local. *Cuad. Urbano* **2012**, *8*, 229–252.
13. Cuenya, B.; Novais, P.; Vainer, C. (Eds.) *Grandes Proyectos Urbanos. Miradas Críticas Sobre la Experiencia Argentina y Brasilera*; Café de las Ciudades: Buenos Aires, Argentina, 2012; ISBN 978-987-25706-3-7.
14. Kozak, D.; Jajamovich, G. Grandes proyectos urbanos: Una definición elusiva. In *Grandes Proyectos Urbanos. Conceptos Clave y Estudios de Caso*; Cuenya, B., Elinbaum, P., Ziccardi, A., Eds.; Universidad Nacional Autónoma de México: Mexico, DF, USA, 2020; pp. 47–60.
15. Jajamovich, G. Grandes proyectos urbanos alternativos a los grandes proyectos urbanos: Una revisión a partir del concepto de just city. *Cuad. Geogr. Rev. Colomb. Geogr.* **2019**, *28*, 394–407. [CrossRef]
16. Pibus, M. Desmontando Dogmas: La Desregulación Urbanística. 2012. Available online: https://latramaurbana.net/2012/11/21/desmontando-dogmas-la-desregularizacion-urbanistica/ (accessed on 10 January 2021).
17. Díaz Orueta, F. Sociedad, espacio y crisis de la ciudad neoliberal. In *Metamorfosis Urbanas. Ciudades Españolas en la Dinámica global*; Cucó, J., Ed.; Icaria: Barcelona, Spain, 2013; pp. 81–107.
18. Gaja Díaz, F. Urbanismo concesional, modernización, privatización y cambio de hegemonía en la acción urbana. *Ciudades* **2015**, *18*, 103–126. [CrossRef]
19. Pinson, G. *Urbanismo y Gobernanza de las Ciudades Europeas. Gobernar la Ciudad por Proyecto*; Publicacions de la Universitat de València: València, Spain, 2011; ISBN 9788437080994.
20. Roch Peña, F. Revolución neoliberal y "utopía" ciudadana, una batalla inaplazable. *Ciudades* **2015**, *18*, 49–68. [CrossRef]
21. Romero, J.; Melo, C.; Brandis, D. The neoliberal model of the city in Southern Europe. A comparative approach to Valencia and Madrid. In *Cities in Crisis. Socio-Spatial Impacts of the Economic Crisis in Southern European Cities*; Knieling, J., Othengrafen, F., Eds.; Routledge: London, UK, 2016; pp. 73–93, ISBN 9781138850026.
22. Martí-Costa, M.; Tomàs, M. Crisis y evolución de la gobernanza urbana en España. *Ciudad. Territ. Estud. Territ.* **2016**, *188*, 187–200.
23. Díaz Orueta, F. Spain: Local Democracy and Citizen Participation. *Space Polity* **2006**, *10*, 263–278. [CrossRef]
24. Camacho, J.; Díaz Orueta, F.; Gadea, M.E.; Ginés, X.; Lourés, M.L. Madrid: Los discursos sobre la crisis de un modelo urbano agotado. In *Ciudades y Cambios de Época: Discursos Sobre las Políticas Urbanas y Crisis en España en el Escenario 2015*; Subirats, J., Martí-Costa, M., Eds.; Universidad del País Vasco: Bilbao, Spain, 2015; pp. 58–89.
25. Díaz Orueta, F. El impacto de los megaproyectos en las ciudades españolas. Hacia una agenda de investigación. *Estud. Demográficos Urbanos* **2009**, *24*, 193–218. [CrossRef]
26. Bellet, C. Proyectos y grandes operaciones urbanas. In *Naturaleza, Territorio Y Ciudad En Un Mundo Global*; Allende, F., Cañada, R., Fernández-Mayoralas, G., Gómez, G., López, N., Palacios, A., Rojo, F., Vidal, M.J., Eds.; AGE/UAM: Madrid, Spain, 2017; pp. 1240–1265.
27. Leal Maldonado, J.; Domínguez Pérez, M. Transformaciones económicas y segregación social en Madrid. *Ciudad Territ. Estudios Territ.* **2008**, *158*, 703–726.
28. Méndez, R. Expansión y crisis del modelo neoliberal en Madrid. In *La Ciudad Neoliberal. Gentrificación y Exclusión en Santiago de Chile, Buenos Aires, Ciudad de México y Madrid*; Hidalgo, R., Janoscka, M., Eds.; Pontificia Universidad Católica de Chile: Santiago de Chile, Chile, 2014; pp. 217–232.
29. Diaz Orueta, F. Madrid: Urban Regeneration Projects and Social Mobilization. *Cities* **2007**, *24*, 183–193. [CrossRef]
30. Alguacil, J.; Fuente, R.; Martínez, M.A.; Ubrich, T.; Velasco, M. Madrid. In *Políticas Urbanas en España. Grandes Ciudades, Actores y Gobiernos Locales*; Subirats, J., Martí Costa, M., Iglesias, M., Tomás, M., Eds.; Icaria: Barcelona, Spain, 2011; pp. 105–142.
31. Morcillo Álvarez, D. Producción de espacio en la expansión neoliberal en Madrid. *Scr. Nova Rev. Electrónica Geogr. Ciencias Soc.* **2017**, *21*. [CrossRef]
32. Brandis, D. Grandes proyectos de transformación urbana pendientes en Madrid. In *Nuevos Escenarios Urbanos: Nuevos Conflictos y Nuevas Políticas*; Castañer Vivas, M., Rufi, J.V., Feliu Torrente, J., Martín Uceda, J., Eds.; AGE/Universitat de Girona: Girona, Spain, 2017; pp. 151–168.
33. Arias, F. Megaproyectos urbanos madrileños. In *Economía, Poder y Megaproyectos*; Aguilera, F., Naredo, J.M., Eds.; Fundación César Manrique: Madrid, Spain, 2009; pp. 181–208.
34. Archivo: Cuatro Torres Business Area. JPG. Available online: https://es.wikipedia.org/wiki/Archivo:Cuatro_Torres_Business_Area.JPG (accessed on 30 March 2021).
35. Brandis, D. Grandes proyectos urbanos y desarrollos residenciales: Del urbanismo de mercado a un nuevo modelo para Madrid. *Ciudad Territ. Estudios Territ.* **2018**, *198*, 731–747.
36. El Tribunal Superior de Justicia de Madrid Anula el Plan Urbanístico de la Llamada Operación Chamartín. Available online: https://www.poderjudicial.es/cgpj/es/Poder-Judicial/Tribunales-Superiores-de-Justicia/TSJ-Madrid/Noticias-Judiciales-TSJ-Madrid/ci.El-Tribunal-Superior-de-Justicia-de-Madrid-anula-el-plan-urbanistico-de-la-llamada--operacion-Chamartin-.formato3 (accessed on 10 May 2021).
37. Comunidad de Madrid. *ACUERDO de 22 de Julio de 2020, del Consejo de Gobierno, por el que se dan por Cumplidas las Condiciones Establecidas en el Anexo del Acuerdo de 25 de Marzo de 2020, del Consejo de Gobierno, por el que se Aprueba Definitivamente la Modificación Puntual del Plan General de Ordenación Urbana de Madrid en los Ámbitos de Planeamiento APR 08.03 "Prolongación de la Castellana" y*

APE 05.27 "Colonia Campamento" Para la Definición de las Determinaciones y Parámetros de Ordenación de la Operación Urbanística "Madrid Nuevo Norte"; BOCM: Madrid, Spain, 2020.
38. Las obras de Madrid Nuevo Norte empezarán en 2020 al llegar ya el último informe. Image by Rogers Stirk Harbour + Partners. Available online: https://www.madridiario.es/madrid-nuevo-norte-2020-ultimo-informe (accessed on 9 January 2021).
39. Brandis, D.; Rio, I. Las grandes operaciones de transformación urbana. El Pasillo Verde Ferroviario de Madrid. *Ería* **1995**, *37*, 113–128.
40. Díaz Orueta, F. Megaproyectos urbanos y modelo de ciudad. El ejemplo de Madrid Río. *Cuad. Urbano. Espac. Cult. Soc.* **2015**, *19*, 179–200.
41. STSJ M 6630/2016-ECLI:ES:TSJM:2016:6630-Poder Judicial. Available online: https://www.poderjudicial.es/search/openCDocument/58390c5d580b98efddaedeee435516729af68ba00d48c7f4 (accessed on 10 May 2021).
42. La Justicia Declara Nulo el Plan Parcial del Mahou-Calderón. Image by Estudio Álvarez Sala/Estudio Rubio Arquitectura. Available online: https://www.madridiario.es/434615/tsjm-plan-parcial-mahou-calderon (accessed on 9 January 2021).
43. El Tribunal Supremo avala el Plan de Ordenación Urbana de Madrid que afecta al estadio Wanda Metropolitano. Available online: http://www.poderjudicial.es/cgpj/es/Poder-Judicial/Noticias-Judiciales/El-Tribunal-Supremo-avala-el-Plan-de-Ordenacion-Urbana-de-Madrid-que-afecta-al-estadio-Wanda-Metropolitano (accessed on 10 May 2021).
44. Comunidad de Madrid. Área de Gobierno y Desarrollo Urbano Sostenible.Presentación de la Propuesta para el Plan Mahou Calderón. Available online: https://www.madrid.es/UnidadesDescentralizadas/UDCMedios/noticias/2016/07Julio/01%20Viernes/NotasdePrensa/MahouCalderon/ficheros/Mahou-Calder%C3%B3n.ppt (accessed on 11 January 2021).
45. El Nuevo Barrio que Nacerá Sobre el Estadio. Available online: https://www.elmundo.es/economia/2017/02/17/58a5cb4646163f04718b45df.html (accessed on 11 January 2021).
46. Comunidad de Madrid. *Modificación Puntual del Plan General de Ordenación Urbana de Madrid de 1997 Área de Planeamiento Específico A.P.E. 02.27 "Nuevo Mahou-Calderón" Distrito de Arganzuela*; BOCM: Madrid, Spain, 2018.
47. Bardají, E.; Asociados, S.L. Available online: http://www.ebardaji.es/es/noticia/133-junio-2020 (accessed on 30 March 2021).
48. Presentación de la Propuesta Para el Plan Mahou-Calderon. Available online: https://www.madrid.es>ficheros>Mahou-Calderon (accessed on 30 March 2021).
49. Bardají, E. La ordenación urbana del ámbito "Mahou Calderón" (Madrid). *Planure Territ. Urban. Paisaje Sostenibilidad Diseño Urbano* **2018**, *12*, 2340–8235.

urban science

MDPI

Article

Opaque Urban Planning. The Megaproject Santa Cruz Verde 2030 Seen from the Local Perspective (Tenerife, Spain)

Marcus Hübscher * and Johannes Ringel

Institute of Urban Development and Construction Management, University of Leipzig, 04109 Leipzig, Germany; isb@wifa.uni-leipzig.de

* Correspondence: huebscher@wifa.uni-leipzig.de; Tel.: +49-341-97-33768

Abstract: Megaprojects, as a part of neoliberal urbanism, have become an important element of cities worldwide. In Santa Cruz de Tenerife, Spain, the megaproject Santa Cruz Verde 2030 represents this type of project. The ambitious plan seeks to transform the city's oil refinery into an urban quarter. However, since its announcement in summer 2018, no critical public discussion has taken place, although the project is expected to reconfigure the city's waterfront and its tourist model. In this context, it is particularly the stakeholders' point of view that is neglected. We thus offer a qualitative analysis of five interviews with local stakeholders from the real estate sector, politics, urban planning and an environmental association. The analysis shows that the interviewees feel insufficiently informed by the project's initiators. The project is interpreted as an elitist symbol of how the project's initiators understand urban development. While some of the stakeholders want to accelerate the whole process, others call for a more integrative and participative planning approach. Moreover, the observed marketing campaign is directly linked to the upcoming elections. The interviewees observe a simple top-down planning process, which contradicts the promises of the initiators to enable civic participation and integration.

Keywords: megaprojects; neoliberalism; urban development; urban planning; Santa Cruz de Tenerife; Spain

Citation: Hübscher, M.; Ringel, J. Opaque Urban Planning. The Megaproject Santa Cruz Verde 2030 Seen from the Local Perspective (Tenerife, Spain). *Urban Sci.* **2021**, *5*, 32. https://doi.org/10.3390/urbansci5010032

Received: 3 January 2021
Accepted: 13 March 2021
Published: 17 March 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

Megaprojects have become typical elements of today's urbanism around the globe. Cities such as Barcelona (22@), Valencia (Ciutat de les Arts i les Ciències) or Hamburg (Hafencity) have shown how megaprojects are used as an effective tool to reposition themselves within the global competition [1]. However, behind the bright mask of megaprojects, there is often a less appealing story of underestimated costs, construction time and overestimated benefits [2]. There is a "new generation of megaprojects" [3] (p. 761) that is linked to neoliberal logics and marked by the creation of sustainable project images. However, unmasking these concepts often reveals unsustainable practices.

This paper focuses on Santa Cruz Verde 2030, an emerging megaproject in Tenerife (Spain), which was announced in summer 2018 (see Figure 1). The project deals with the conversion of an inner-city oil refinery into a mixed-use urban quarter with a surface area of more than 500,000 square meters. The concept entails a large amount of green spaces, but also housing, tourism and the city's first urban beach [4]. The impacts on the city's urbanism are expected to be considerable. According to other studies, the project will double the city's number of hotel beds and reconfigure the current urban setting significantly [5].

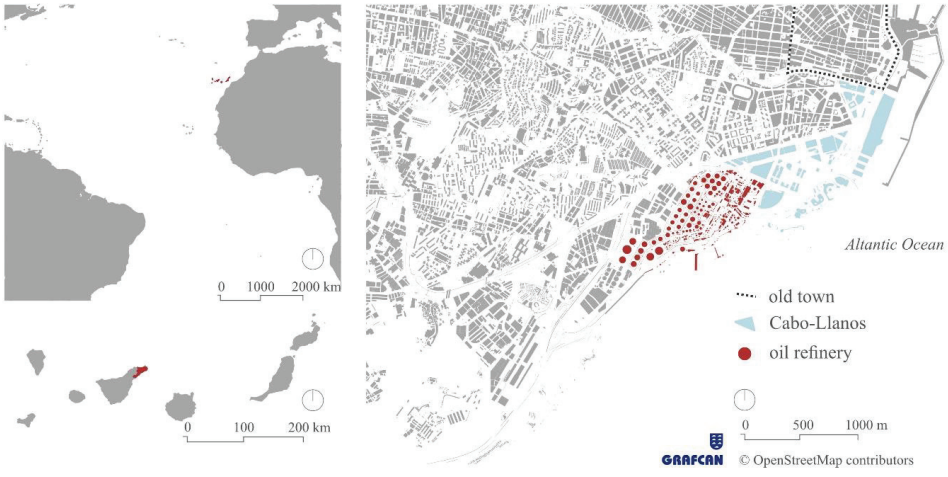


Figure 1. The geographical setting of the oil refinery and the Cabo-Llanos neighborhood, which formed part of the refinery until the 1990s. Own elaboration based on Open Street Map [6] and Grafcan [7].

Until 2020, the urban planning process has been characterized by its exclusiveness, as the two initiating stakeholders, the town hall of Santa Cruz de Tenerife and the refinery's owner, the Compañía Española de Petróleos (CEPSA), have negotiated behind closed doors.

It thus comes as a surprise that in Santa Cruz, only little public discussion about the project has taken place so far. Hence, this study shifts the light from the project's design to the planning process itself, seen through the perspective of relevant urban stakeholders in Santa Cruz. Research on megaprojects has focused on stakeholders that are in charge, but not on those who might be affected indirectly [8] (p. 1537). With this paper, we aim to bridge the gap between "top-down built megaprojects [and] bottom-up perceptions" [9]. Our objective is to understand the local stakeholders' perspective on the megaproject Santa Cruz Verde 2030 using five qualitative interviews with stakeholders from politics, urban planning, the real estate sector and an environmental association. Although the planning of the megaproject has just begun and the final outcome of the process might be uncertain, we argue that now is the time to start the analysis from a scientific point of view. As several planning steps are pending [10], there is still the opportunity to influence the project and contribute to a more sustainable outcome, which is our research motivation.

This article presents the following structure. Section 2 sets up a theoretical framework for analyzing the chosen megaproject. In Section 3, the case study is introduced. Section 4 describes the applied methods. The fifth part of this article presents the empirical results and emphasizes planning and image. In the final section, we discuss the findings and put them into their context of the current discourse.

2. Megaprojects: Grand Images, Little Transparency?

Megaprojects [11], large-scale urban development projects [12] and grand projects [13] are often synonymously used terms describing projects that are complex from different points of view [14]. On the one hand, megaprojects are instruments to gain an international audience and are expected to cause multiple direct and indirect effects for the surroundings [15] (p. 144). On the other hand, they have a long history of wrong estimations, particularly when it comes to costs, construction time and final output. This pattern is also referred to as the "iron law of megaprojects" [2] (p. 2).

Different approaches exist that help to define megaprojects. Some scholars focus on quantitative aspects and investigate costs, scale or risk [15]. Therefore, a broad range of

what is considered a megaproject exists. While Stoddart-Stones sees a minimum value of GBP 150 million [16], Bruzelius et al. propose costs of USD 1 billion or more [15]. Apart from that, there are also attempts to understand megaprojects from a qualitative point of view. In this paper, we focus on this approach, as it allows us to explore (a) the large networks of stakeholders involved [17] (p. 620), (b) the intertwined relationship between public and private actors [18] (p. 240) and (c) the characteristics to transform urban settings [12] (p. 75).

During the last two decades, Diaz Orueta and Fainstein have observed a new generation of megaprojects [3]. This new generation is characterized by projects that try to avoid public protest, and contribute to post-democratic conditions, which is understood as a "replacement of debate, disagreement and dissent in current urban governance" [19] (p. 72). In order to avoid protest movements, "new" megaprojects firstly entail mixed uses instead of focusing on single aspects. Consequently, the projects can be sold to a variety of groups as beneficial [1] (p. 800). Secondly, present megaprojects are often situated on brownfield sites, which minimizes direct displacement of inhabitants or local businesses [3] (p. 760). Thirdly, project managers put notable emphasis on marketing- and image-related topics. It is the concept of (environmental) sustainability that is often used, although the output might differ significantly from the promises made. In that respect, green logics even serve to justify the legitimation of the projects [3] (p. 764).

However, deconstructing the sustainable mask of these projects reveals numerous not sustainable practices, such as non-transparent planning mechanisms, as illustrated by Lehrer and Laidley [1] (p. 795). It is the interest of selected middle and upper classes that dominates megaprojects' concepts, rather than applying a participative understanding of planning [20] (p. 547). This also explains why large-scale projects are poorly integrated into the urban process and their conception lies at the margins of formal planning structures [20] (p. 577). Another paradox is the relationship between project management and civic society. Megaprojects are often used to gain a wide public audience and increase the city's visibility in a global competition [21] (p. 54). Simultaneously, an obvious tendency of masking certain aspects of the projects is observed, also referred to as the "hiding hand" [22] (p. 12). Contrary to that, project marketing and communication focus on potential benefits, which are often expected to reach the whole city. This phenomenon also explains the high attractiveness to announce megaprojects during election campaigns [23] (p. 257).

The rise of megaprojects as a common tool of urban planning is not only linked to general political settings but also to spatial and structural conditions in cities. This kind of cooperation between public and private stakeholders has become an important tool in the neoliberal city [24] (p. 76), used to "reconfigure local land-use patterns" [25] (p. 61). Megaprojects stand for the restructuring of urban governance under neoliberal frameworks [26]. The main goal of such projects is to create "profit-oriented urban entities" [27] (p. 77) spurring the commodification of the city [28]. On that basis, we understand neoliberal urbanism as a way of making the city that puts entrepreneurial interests first while neglecting the needs of other urban groups. Based on the increasing inter-city competitiveness and the prevailing ways of "producing a successful city" [29] (p. 1), city governments aim to foster growth and communicate economic success to reposition themselves within the global urban hierarchy. Large-scale urban development projects are not only regarded as powerful tools but also as new instruments to conduct planning and to achieve these objectives [20] (p. 547). Hence, research has to be conducted to deconstruct the planning processes observed. This is the case if established and more participative ways of planning the city are avoided. According to Swyngedouw, these practices belong to new forms of governance that promise to "deepen democracy" [30] (p. 3), while, in fact, they do the opposite.

Addressing these aspects from a local stakeholder's point of view is one feasible access, but it is still a perspective that is researched to a lesser extent [9]. However, this perspective is relevant because local groups will not only experience the externalities of the megaproject [31] but are also considered to be of crucial importance for the project's success [32].

This is a consensus that has been agreed upon both in the European (Aalborg Charta) [33] and the international discourse on sustainability (UN Habitat III) [34]. Although participation does not guarantee a sustainable outcome in the stricter sense, it strengthens democratic structures and helps inhabitants to find an access to new urban projects. This is why participation is regarded as an important pillar in sustainability concepts for urban regeneration projects and is included in several indicator systems [35–38], but also in city concepts based on the 17 Sustainable Development Goals of the United Nations [39].

Now, shifting the light on our case study, the abovementioned aspects identified in the literature serve as starting points for our empirical investigation. We summarize the following three questions, which will help to structure both our research tool (qualitative interviews) and, later, the discussion:

- What is the local stakeholders' point of view on the megaproject? Does it reflect the criticism observed in the academic discourse (neoliberal contexts, elitist interest, a new generation of megaprojects, etc.)?
- How is the concept of sustainability in the megaproject perceived by local stakeholders? On that basis, what is the relation to image and marketing?
- How do local stakeholders imagine their participation in the project?

3. Santa Cruz: Introducing the Case Study

This paper deals with the megaproject "Santa Cruz Verde 2030", which aims to transform an inner-city oil refinery (Figure 2) into a new urban neighborhood. Santa Cruz is the capital of Tenerife and co-capital of the Canary Islands, one of the 17 Spanish autonomous communities. With its 200,000 inhabitants, the city forms part of the metropolitan area of the island, where about 400,000 inhabitants live [40].

Figure 2. The oil refinery "Tenerife" in Santa Cruz de Tenerife. Own photographs.

Founded in 1930, the industrial plant "Tenerife" was Spain's first oil refinery. It became a fundamental pillar in Santa Cruz's economy, but it was also an important sponsor of culture, education and housing programs in the city [41]. The refinery owned by CEPSA diversified the archipelago's economic structure, which is increasingly dominated by tourism. Considering the gross value added, the share of the industrial production dropped from 10.9% to 5.6% between 2000 and 2018 on the Canary Islands [42].

Due to the strong population growth (62,000 in 1930 to 223,000 in 2010), the urban setting of the refinery changed completely [40]. While it was originally located on the outskirts of Santa Cruz, it was soon surrounded by several neighborhoods (see Figure 1). This is linked to the scarcity of space in Santa Cruz, an insular city limited by the Atlantic Ocean in the south and the Anaga Mountains in the north. The pressure on the housing market has become highly visible in 2018, when Santa Cruz showed the highest increases in housing prices in Spain, although its population slightly decreased in the last ten years [43,44]. As a result, there are considerable economic interests that aim to urbanize

the refinery's area. During the last decade, increasing pressure has been put on the refinery. The argument that is put forward is based on environmental and safety issues, as the industry is on the list of the 200 most contaminating industries in the European Union [45]. Finally, in June 2018, CEPSA and the town hall announced the dismantling of the oil refinery and presented "Santa Cruz Verde 2030" (see Figure 3) [46]. Its concept entails 40% green spaces, but also 20% for residential and 10% for touristic uses.

year	proceedings
1930	founding of Spain's first oil refinery on Tenerife
⩘	
1990	The Cabo-Llanos plan was implemented: start of the dismantling of the eastern part o the refinery
01/2014	implementation of new air quality plan by the Canarian government; the oil refinery stops refining
06/2018	announcement of Santa Cruz Verde 2030 by local government (Coalición Canaria anc Partido Popular)
05/2019	municipal elections in Santa Cruz de Tenerife
06/2019	new government took over the town hall (PSOE and Ciudadanos)
07/2020	motion of censure against the government of PSOE and Ciudadanos; the former government (Coalición Canaria and Partido Popular) regains mayoralty

Figure 3. The history of the oil refinery "Tenerife" in Santa Cruz de Tenerife and current politics. Own elaboration based on Arencibia de Torres [41], Gobierno de Canarias [47] and Santa Cruz de Tenerife Ayuntamiento [4].

We chose the case of Santa Cruz Verde 2030 for two reasons. Firstly, our analysis will contribute to the still ongoing planning process. As the project has just begun, the starting point of our investigation lies in the public–private agreement, announced in summer 2018 [4]. However, the actual importance of this document can be questioned due to various reasons. The document is not binding, as it is not implemented in formal planning instruments. Moreover, a considerable number of technical questions remain, such as juridical problems concerning the land classification and upcoming claims of formerly expropriated landowners [48]. From the administrative perspective, the local government of the municipality changed two times since the announcement of the megaproject (see Figure 3). This has not only led to a time delay in the planning processes but has also left the current state of the project rather unclear. Consequently, the public–private agreement is currently the only existing and most detailed document of how the project initiators imagine the production process of the megaproject to take place. By understanding this process, we can contribute to increasing its transparency. This is also relevant if we consider the polarized urban setting in Santa Cruz [49].

Secondly, Santa Cruz is the only large city worldwide with this type of industry in a central district [50]. However, Santa Cruz represents a considerable number of cities where deindustrialization goes hand in hand with touristification [51,52] and gentrification [53], most notably on the city's waterfront [54]. This relationship between the city and water has been reshaped by several large-scale projects in recent years. Since the 1990s, a general conversion can be observed, shifting the port's character from industrial to recreative

functions. The areas nearest to the city center (for example, Plaza de España) have been of particular interest in this reconversion and have been renewed with projects from the star architects Herzog and De Meuron [55] (p. 917). Apart from that, an adjacent quarter south of the center, the so-called "Cabo-Llanos Plan", transformed large parts of the city into an affluent area and displaced an entire neighborhood [56]. This strategic shift of the port's function was also possible due to the megaproject "Puerto de Granadilla". This new port constructed in the south of Tenerife is supposed to relocate industrial activities from Santa Cruz to the south and make space for further commodification and privatization at the waterfront of the island's capital [57]. Hence, we argue that our analysis of the chosen case study enriches the discussion about megaprojects and governance both in academia and the city. This is the case as we refer to the existing research gap in the stakeholders' perspective (see Section 4). It is of particular interest how the new megaproject Santa Cruz Verde 2030 on the city's last central brownfield site is developed—and whether or not it follows the trajectories of an exclusionary urbanism that is found in Santa Cruz.

4. Materials and Methods

This paper aims to understand the planning process of Santa Cruz Verde 2030 from a stakeholder perspective. There is a research gap in local perceptions of megaprojects in general [9]. However, the question of which stakeholder groups are relevant for large-scale urban development projects has already been addressed by several authors, both from a theoretical and a practical point of view [32,58,59].

For our study, we chose to follow the CABERNET (Concerted Action on Brownfield and Economic Regeneration Network) stakeholder model [60] to identify different local experts. CABERNET is a European scientific platform that aims to facilitate the development and reuse of brownfield areas. This stakeholder model entails both primary and secondary actors. The projects' initiators or responsible planners are primary stakeholders because they actively shape the project. Contrary to that, secondary stakeholders influence and are influenced by the project, "but are not directly involved in it" [9] (p. 4). We selected actors from both stakeholder groups (see Figure 4) to seize different perceptions of the megaproject.

No.	profession/ function	date	place
I1	territorial representative of the Professional Association of Real Estate Experts (APEI)	23.08.2019	office of the interviewee, Santa Cruz de Tenerife
I2	representative of the urban planning office, Santa Cruz de Tenerife	30.08.2019	office of the interviewee, Santa Cruz de Tenerife
I3	real estate agent, 40 years of working experience in Santa Cruz de Tenerife	02.09.2019	office of the interviewee, Santa Cruz de Tenerife
I4	preservationist, former politician (Coalición Canaria)	04.09.2019	public café, Santa Cruz de Tenerife
I5	representative of a local environmental association (Ecologistas en Accion)	12.09.2019	public café, San Cristóbal de la Laguna

Figure 4. Interviewees and their professions. Own elaboration.

The representative of Santa Cruz's urban planning office is a primary stakeholder because the public planning authority is a mayor institution based on the public–private partnership announced by CEPSA and the town hall [4]. However, this person did not

initiate the megaproject because of a change in the local government in June 2019 (see Figure 3). We also contacted primary stakeholders that were responsible for the elaboration of the plan Santa Cruz Verde 2030 in the first place such as CEPSA and the responsible politicians from Coalición Canaria and Partido Popular. Their opinion is essential in order to contrast both internal and external points of view. Unfortunately, they were not willing to take part in the investigation at this point. Consequently, our results are limited to some extent because they lack this point of view.

Apart from that, several secondary stakeholders such as neighborhood associations and real estate experts were willing to participate. The interviewees were chosen by means of online desktop research, based on the stakeholder groups identified by CABERNET [60] (p. 20). Some of them were selected due to their profession, others because they had joined the public discussion and commented on the megaproject in newspaper articles and interviews. We conducted five qualitative interviews in summer 2019 in Santa Cruz de Tenerife (see Figure 4). All of the interviewees were interested in receiving the results of our research, which will help to add our findings to the local discourse.

The research method we propose is a semi-structured interview as one type of qualitative expert interview [61] (p. 418). It consists of key questions [62] (p. 291) which allows us to delve deep into social matters [63] (p. 315). The guideline helps to stick to the topics that were indicated as relevant for our research interest. Moreover, it provides comparability between the interviews. However, still, it depends on how the question is put forward [64] (p. 755). Semi-structured interviews also enable the interviewer to drop questions that do not lead to the aimed output while others can be added spontaneously [63] (p. 316). This puts the interviewees in the position to follow aspects that they consider to be important [64] (p. 755) [65] (p. 179), which is fundamental with regard to the aim of this research.

The objective is to understand the perception of the stakeholders. This requires a certain openness of the questions and the conversation, as the interviewer might not consider each relevant aspect in advance with the prepared questions. The aim is to address both the internal expertise in the professional field of work of each expert but also the capacity to reflect these aspects [66] (p. 31). We regard semi-structured interviews as an instrument not only to understand stakeholders' opinions but also the logics behind the social constructs they explain [67].

Our guideline consists of several thematic blocks that slightly differ from interviewee to interviewee, depending on each professional context. The interviews with real estate experts of course put a stronger focus on the local housing market compared to the interview with the representative of the planning office and so forth. Nevertheless, the basic structure of each guideline remained the same based on the main topics discussed in Section 2 (such as "the image of the project", "the perception of the ongoing planning process" and "the relationship between project and city"). Each topic is introduced with an open and more general question that stimulates the interviewee to narrate (for example, "How do you perceive the project Santa Cruz Verde 2030?") [65]. After that, we used follow-up questions to maintain the topic or comprehension questions to dive deeper into it [64] (p. 758). The interviews were held in Spanish and recorded after the stakeholders gave permission. The material was treated according to the General Data Protection Regulation of the European Union [68,69].

We transcribed the material using the software F4 and analyzed it with MAXQDA. A qualitative content analysis is the basis of our research. This means that the material is analyzed step by step putting the "categories in the center" [70] (p. 3). This procedure is systematic and requires developing one part of the categories with the material [71] (p. 2). The code system was set up with a mixed approach. While some of the codes were already defined due to theory and the interview guideline (deductive, for example, "urban context", "post crisis", "uses in the megaproject"), the code system was complemented by the material itself (inductive) [72] (p. 64). This applies to codes such as "level of information"

or "political dimension of monument preservation" because these aspects have not been on our agenda previously. Our main categories are shown in Figure 5.

urban development in Santa Cruz	**monument preservation**	**neighborhoods**
crisis 2008	elements	change
post-crisis	political dimension	housing market
housing market	planning	history
tourism/ short-term rentals	El Tanque	Cabo-Llanos
Santa Cruz Verde 2030	**sustainability**	
image	ecological aspects	
uses/ functions	integration	
deindustrialization	qualities	
planning	aesthetics	
political dimension	qualities	
transparence		

Figure 5. Main categories and subcategories in the qualitative analysis. Own elaboration.

On that basis, we defined subcategories [73] (p. 96) to complete the code system, although we omitted third-level categories for reasons of clarity in Figure 5. The result is a matrix composed of topics in columns and interviewees in rows which leads to concrete text passages in the cells. This matrix can be interpreted focusing on certain interviewees or categories but also allows us to compare the cases with each other [72] (p. 50). For this paper, we put the focus on the main categories "urban development", "Santa Cruz Verde 2030" and "sustainability". These categories were directly related to our paper's topic.

5. Results: The Stakeholders' Perspectives

This section presents the empirical findings of the conducted interviews and puts them into their theoretical context. Two subtopics are addressed. We firstly analyze the general planning process before we deconstruct the image created by primary stakeholders.

5.1. Planning Process

In general, the mere fact that the local oil refinery is going to be dismantled is perceived as positive by all of the stakeholders. It is rather the surprising announcement of the megaproject and the public–private agreement itself that causes contradicting perceptions among the interviewees. For some of them, such as those from the real estate sector, the project is not advancing fast enough. The representative of the local real estate association points out that from his point of view, "there is no formalized agreement" [74] (l.6). He even questions the title of the announcement and insists that the document should rather be regarded as "pre-agreement" [74] (l.25). He justifies this opinion with the lack of concreteness in the document. Indeed, it remains rather vague, as the contract presented by CEPSA and the townhall describes very general goals such as sustainability and the remodeling of Santa Cruz's waterfront. The urbanistic figures it contains, such as planning parameters, have provoked confusion among the interviewees. Presenting concrete numbers is far too rushed [75] (l.8), as they do not have a legal bindingness. This is why all of the stakeholders highly doubt the quality of the planning process and criticize prevailing uncertainties in the plan. Critics range from "there is literally nothing" [74] (l.24) to "it's a plan without urbanism" [76] (l.18). It is not untypical in urban development contracts to start with a rather general first version. This can be concretized and complemented by further agreements [77]. However, the prevailing document lacks a concrete (time) schedule, which could increase its transparency and acceptability.

Apart from that, one out of five interviewees felt sufficiently informed about the project itself. Only the representative of a monument preservation association gained insights into the process because she actively investigated. She also had contacts to primary stakeholders in charge due to her former political career [76] (l.22). The other interviewees clearly criticized the communication management of the megaproject's initiators [74] (l.24) [78] (l.32). One interviewee summarized it in the following way: "In the initial phase of the agreement between CEPSA and the town hall the process has not been transparent at all, which means, [. . .] they sat down, they negotiated, they signed and there was nothing communicative about it" [79] (l.32). This policy of non-transparency is linked directly to the fact that no considerable public discussion is taking place: "Those of us who could have been critical did not have enough information to be critical" [79] (l.56). This observation represents what has been described in Section 2 as the underlying intention to prevent critical opinions. The problem is considered to be a structural one: "Certain political organizations have a habit of not being transparent, but of doing everything behind the citizen's back. It's a historical habit" [79] (l.38). This non-transparent situation leaves stakeholders disappointed, also because it seems to be a regular thing in the city's urban planning: "Every time the politicians go ahead, without considering that they motivate us and then the years pass by, as it has happened in so many cases" [74] (l.6).

5.2. Image and the Political Dimension

As has already been indicated in Section 2, a strong focus on image- and marketing-related instruments is a typical characteristic of current megaprojects. This is also the case in the prevailing case study. The interviewees notice "a very strong marketing campaign [. . .]" [79] (l.32). In that respect, not only representative 3D models in images and videos were published by the initiators [76] (l.100). The whole marketing campaign is perceived as disproportional: "these are information and news with a hype, simply to create sensationalism in that moment" [74] (l.6). However, "behind [the image], there is no contents" [76] (l.22).

The interviewees assign the strong motivation to present the megaproject to the media and sell it as a success rather to the townhall than to CEPSA [79] (p. 32). According to the interviews, this is based on political interests. A direct relation to the upcoming municipal election is suggested, which took place only eleven months after the first announcement of Santa Cruz Verde 2030 [74] (l.22) [79] (l.52). Some even see in the upcoming election campaign the main motivation behind the project: "I know that their priority was to announce the project before the elections" [76] (l.22). For the former mayor Bermúdez and his party, the regionalist Coalición Canaria, this strategy has paid off, as they increased their result about 28% and defended the largest parliamentary group with currently more than one third of all city councilors [80]. Nevertheless, they lost the mayoralty temporarily. The oppositional left-wing and liberal parties formed a stronger coalition that led to a change in the municipal government in June 2019. The liberal party Ciudadanos was part of this new government and occupied henceforth the area of urban planning in the city. It thus became responsible for Santa Cruz Verde 2030. Interestingly, in the interview, the new head of the municipal planning office admitted that he did not even study in detail the public–private agreement announced by the anterior government [75] (l.5). This symbolizes the value he assigns to the document. From this moment on, a policy change concerning the announced megaproject was observed. A much less public-oriented approach was focused on. It follows the argument that a deeper analysis of the megaproject's setting, its opportunities and limitations is required [75] (l.8). The interviewee places the responsibility for that on the technicians who elaborate the new land-use plan of the city [75] (l.10). The less publicity-related way of working of the new government has also led to the perception that the new government did not bring forward the megaproject sufficiently [74] (l.6). The preservationist puts it this way: "They still don't know what to do" [76] (l.36), while the representative of the environmental association observes that "with the new government in charge, the whole project has been paralyzed" [79] (l.82).

In July 2020, the former mayor Bermúdez was able to regain the mayoralty because the city councilor of Ciudadanos (who was head of the planning office) left the government due to internal conflicts [81]. It is not clear if the megaproject Santa Cruz Verde 2030 was part of the conflicts that the politician described. It has also led to a change in public communication with regard to the megaproject—again. Since July, new pieces of information on how the megaproject is advancing have been distributed by the new government. This was promoted as a new set of policies including the reopening of the negotiations with CEPSA, but also the establishment of a task force [10,82]. However, this most recent episode of the planning process did not form part of our research because the interviews had taken place before the government changed again.

The aforementioned findings reveal how the megaproject has become highly political. Both opposition and government argue on how to best approach this highly complex project. The current government under Bermúdez is trying to establish new alliances with secondary stakeholders such as the architectural association of the island [10]. The aim is to integrate the knowledge on urbanism of this institution into the planning process. Simultaneously, there is still an ongoing legal dispute promoted by the Partido Socialista Obrero Español (PSOE), which denounced the public–private contract to be misleading. According to their perception, it must not be considered as a contract because it lacks legal cohesiveness. The court decision is still underway [83].

6. Discussion

This paper aimed to explore the stakeholders' perceptions of the megaproject Santa Cruz Verde 2030 in Tenerife, Spain. This was conducted using qualitative interviews. Our study shows how two different local governments applied two extremes of approaching the megaproject and turned it into a political arena where their conflict is waged. The government that initiated the project in summer 2018 (led by Coalición Canaria and Partido Popular) was highly interested in pushing the megaproject forward by any means and put a strong focus on creating an image around it. This was regarded as window-dressing by the interviewees. The subsequent government that was in charge from June 2019 until July 2020 (PSOE and Ciudadanos) had a more conservative point of view. It promoted an in-depth analysis by the technicians of the local planning authority without attention-grabbing means. However, it did not comment on the megaproject and failed to inform the public regularly, which associates the stakeholders with a lack of willingness to proceed with the project. In this paper, we put the focus on the planning process before June 2019 and thus on the local government that initiated Santa Cruz Verde 2030 because our interviews took place only about four months after the political change. We want to discuss our main findings based on two aspects, namely, image and planning. It is our responsibility as researchers to help integrate these findings in the local context. We aim to do so by deliberating the results with relevant stakeholders, particularly those in charge, but also by joining the public discussion by means of the media.

6.1. Creating the Image, Not Contents

Firstly, with regard to image, Santa Cruz Verde 2030 reflects certain elements detected in other case studies and the academic discourse. As we depicted in Section 2, there is a new generation of megaprojects and Santa Cruz Verde 2030 fulfils several of the described characteristics [1,3]. The redevelopment of a brownfield site, a mixed-use concept and the (mis)use of sustainability concepts in marketing campaigns are some of these aspects. Our study could not prove one of the main points found in theory, namely, that the project's design was intended to avoid protest [3] (p. 760), as no interviews with the project initiators could be conducted.

However, it is the strong marketing campaign surrounding the megaproject that has initiated a critical discussion among the stakeholders. Interestingly, the mere fact that a new urban quarter is supposed to replace the local oil refinery is generally perceived as positive by the stakeholders. This is also because the industry provoked serious problems such as

contamination and urbanistic barriers in the city [5]. The described positive basic attitude helps to increase the general interest in the megaproject and also decreases protests against the idea itself. This is a difference compared to other megaprojects, where the concept is criticized, as it has been the case before the 2016 Olympics and the 2014 World Cup in Rio de Janeiro [84], the N2 Gateway project in Cape Town [85] or the reconfiguration of Valencia's waterfront to prepare it for The America's Cup and Formula 1 races [86]. It is surprising that the local stakeholders in Santa Cruz show such a critical opinion on the megaproject, and this is due to the strong emphasis on marketing- and image-related topics promoted by primary stakeholders. We explain this focus on the image with the underlying neoliberal logics, where megaprojects are typically "state-led and state-financed" [20] (p. 556).

The non-transparent practices in megaprojects have become symptomatic of this so-called "post-politic city", which describes how open discussions and decision processes are substituted by not legitimized and camouflaged undemocratic structures [87]. The list of non-transparent megaprojects is long, with examples such as Barangaroo (Sydney) [88], Belgrade's waterfront [89] or the Olympic Games in Vancouver in 2010 [90] at the forefront. Further, the Hafencity in Hamburg is an example of where a broad civic participation has not taken place. However, public interests in participating in the planning process have also not been extensive, as neighbors did not feel directly affected [91] (p. 49). The Hafencity is definitely not a showcase of sustainability, but it has addressed several urgent questions in urban development (such as density, diversity, energy and sustainable building) [91] (p. 49). Consequently, the question remains if this project has been sustainable or not [92], considering the fact that less participation apparently makes it easier for local governments to enforce their plan top-down. This is what has been observed by local stakeholders in Santa Cruz, and what is described as "new forms of urban governance" in cities worldwide [13] (p. 8).

Our case represents a significant number of megaprojects with a strong public "control over land use" [93] (p. 168), in order to protect the interests of some classes. Within the context of an entrepreneurial city, we identify two reasons for that. To begin with, in the logic of the so-called CABERNET A-B-C model, Santa Cruz Verde 2030 can be classified as a "potential development site", where high land values are expected, but there are also high reclamation costs due to decontamination and deindustrialization. These projects "are on the borderline of profitability" [60] and hence require a public–private partnership to reduce risks. This significant involvement of public money has to be defended by public stakeholders. A positive image of such projects helps to communicate the benefits of public involvement. Apart from that, by gaining an international audience, multiple direct and indirect effects for the project and the city are expected [15] (p. 144). In theory, Tenerife can reach out easily to this international audience. Based on the island's function as an important tourism destination, there are connections to the rest of Europe but also Africa's west coast. It is not surprising at all that international authors started to report on Santa Cruz Verde 2030 in German or English ([94,95], for example, and transport the project's idea to other countries and target groups. We consider this as a first step to increase the project's visibility in the global competition [21] (p. 54) and attract further capital in the future. This is a goal described in the public–private partnership between Santa Cruz and CEPSA [4] (p. 2). Our case study also shows that neoliberalism does not mean that the state is "less interventionist [...]; rather, it organizes and rationalizes its interventions in different ways" [96] (p. 447). This is the case for many large-scale urban development projects [97] (p. 79). It is also reflected by the fact that it is the local government in Santa Cruz that promotes the megaproject, while the landowner CEPSA remains in the background.

6.2. Management of or for Stakeholders?

Secondly, with regard to planning, neoliberal practices have been applied. Megaprojects are seen as a means to build the city and to avoid existing planning mechanisms. Deconstructing these projects reveals non-transparent planning practices, as has been illustrated by Lehrer and Laidley [1] (p. 795). Rather than applying a participative under-

standing of planning, it is the interest of selected middle and upper classes that dominates megaprojects' concepts [20] (p. 547). This is one of the main doubts that stakeholders pointed out about Santa Cruz Verde 2030, namely, the fact that the private interests of the landowner (CEPSA) are put first. Sustainability is often used to greenwash these aspects and justify the legitimation of the project [3] (p. 764). In the case of Santa Cruz Verde 2030, it is difficult to find stakeholders who would seriously oppose the idea of dedicating more than 40% of the area to green spaces. However, this does not imply that the other 60% does not have to be discussed, and this is exactly what has not taken place in the public discourse.

The highly untransparent planning process stands in complete contradiction to what has been said by project initiators, who promised "civic participation in every phase of the project" [4] (p. 6). The mismanagement of information, which is regarded as intended by the secondary stakeholders, leads to negative reactions. While some of the stakeholders are just very skeptical about the feasibility of the project, others are disappointed because of the expectations it raises. Santa Cruz Verde 2030 is presented in a way that does not encourage public discussions but puts a focus on image-related aspects. This is seen as a proof for the fact that the project's initiators are more concerned about selling the concept as a success, rather than putting emphasis on contents or participation. It is this culture of not integrating secondary stakeholders that is seen by other scholars [8,98,99].

The planning approach during this first two years since Santa Cruz Verde 2030 has been announced is a "management of stakeholders" [100] (p. 3), which is characterized as manipulative and puts the economic perspective first. Instead, a "management for stakeholders" [100] (p. 3) regards secondary actors as crucial partners whose integration might increase complexity, but also leads to a more sustainable output. Santa Cruz Verde 2030 represents the first approach with a unidirectional flow of information that aims to convince local stakeholders rather than offering concrete opportunities to participate. Although Di Maddaloni and Davis [8] (p. 1538) pointed out that there is still no study that proves how the "management for stakeholders" approach is beneficial to megaproject performance, our study shows that not integrating these secondary stakeholders leaves all of them disaffected. This increases the gap between primary and secondary stakeholders—a matrix where protests against the megaproject are likely to grow. Some of the stakeholders have already started to attack the project. The political opposition has put forward a court case on the public–private agreement in December 2018 [83]. Apart from that, the local association for monument preservation has started an initiative to prevent some of the industrial structures from being demolished [76] (l.18). They sent an application to Tenerife's government and therefore might put terms on the megaproject, without even being integrated by the primary stakeholders. Both examples show how not letting these stakeholders participate might lead to time delays in the planning processes and cost overruns, even if we just take an entrepreneurial point of view [101] (p. 1).

However, the secondary stakeholders feel that Santa Cruz Verde 2030 was used as a political instrument right before the municipal election in May 2019 by Coalición Canaria and Partido Popular. This seems to be a typical habit in the context of megaprojects [102] (p. 251), but, at the same time, megaprojects play a decisive role "in the erosion of democracy" [103] (p. 68). The mechanisms used to implement megaprojects into urbanism indicate an authoritative form of making decisions, as the case of Valencia shows [103] (p. 80). This is reproduced in many cases worldwide and represents the so-called post-democratic way of governing [104]. According to Tarazona Vento [103] (p. 71), this leads to a "depoliticization" of the project because it disappoints the other stakeholders [74] (l.6) and prevents them from participating [79] (l.56).

Our study reveals various deficits from different stakeholders' points of view. More research has to be conducted to understand the project initiators' standpoint, although finding an access to them is difficult due to the high political relevance of the topic. However, this will contribute to a deeper understanding of the wider urban process. What research on megaprojects can do is broaden methods and approaches on how to integrate stakeholders

and how to manage a truly reciprocal communication. The first steps have already been carried out, but it has been shown that there is still a "limited knowledge about the broader involvement of secondary actors" [8] (p. 1552).

This analysis indicates that integrating secondary stakeholders offers the opportunity to benefit from a large pool of knowledge, as the interviewees actively propose ideas to improve the planning process. This entails the request to enable the integration of stakeholders from different backgrounds [76] (l.24). Moreover, an international planning competition is suggested to increase the quality of the project's output [74] (l.29). Apart from that, induced gentrification processes as they have occurred in Cabo-Llanos are seen as a major threat in neighboring quarters of the new megaproject and should be tackled ex ante [79] (l.120).

Our research took place in a pre-COVID-19 setting. This does not mean that the global pandemic will not affect the megaproject, its planning process or the perception of it. On the contrary, in the light of COVID-19, the integration of stakeholders is more important than ever before. Recent studies indicate that the consequences of the pandemic are disruptive and will change the urban system in many ways [105–107]. Santa Cruz Verde 2030 should integrate the lessons learnt during 2020, for example, how to make the urbanism more resilient [108]. This is relevant because there is not only a relationship between the COVID-19 susceptibility and socioeconomic characteristics on the neighborhood scale [109,110]. The pandemic is also expected to increase urban inequalities [111,112]. This will add to the polarized setting of Santa Cruz's southwest, where, adjacent to the oil refinery, both high and low socioeconomic vulnerabilities have been found [49] (p. 78). As lower-income households are hit hardest by COVID-19, for example, due to unemployment [113] (p. 3), the vulnerability to be displaced by gentrification will rise too [114].

This perspective alone gives sufficient reasons to accompany the megaproject from a scientific point of view, particularly against the background of the existing trajectories of touristification and gentrification in Santa Cruz [53]. Letting local stakeholders participate is one feasible approach that will help to ensure a more sustainable output since it is the diversity of stakeholders that makes the city.

Author Contributions: Conceptualization, M.H. and J.R.; methodology, M.H.; software, M.H.; formal analysis, M.H.; investigation, M.H.; resources, M.H. and J.R.; writing—original draft preparation, M.H.; writing—review and editing, M.H. and J.R.; visualization, M.H. All authors have read and agreed to the published version of the manuscript.

Funding: This research received no external funding.

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: All interviewees gave their informed consent for inclusion before they participated in the study.

Data Availability Statement: The data presented in this study are available on request from the corresponding author. The data are not publicly available because interviewees did not give their consent to publish the full interviews online.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Lehrer, U.; Laidley, J. Old Mega-Projects Newly Packaged? Waterfront Redevelopment in Toronto. *Int. J. Urban Reg. Res.* **2008**, *32*, 786–803. [CrossRef]
2. Flyvbjerg, B. What You Should Know About Megaprojects, and Why: An Overview. *Proj. Manag. J.* **2014**, *45*, 6–19. [CrossRef]
3. Diaz Orueta, F.; Fainstein, S. The New Mega-Projects: Genesis and Impacts. *Int. J. Urban Reg. Res.* **2009**, *32*, 759–767. [CrossRef]
4. Ayuntamiento de Santa Cruz de Tenerife; CEPSA. Acuerdo de Colaboración Público-Privada para el Plan Santa Cruz Verde 2030. 2018. Available online: https://www.santacruzdetenerife.es/scverde2030/fileadmin/user_upload/web/SCverde2030/NotadePrensa26062018.pdf (accessed on 10 January 2019).
5. Hübscher, M. From megaprojects to tourism gentrification? The case of Santa Cruz Verde 2030 (Canary Islands, Spain). *Bol. Asoc. Geogr. Esp.* **2019**, *83*, 1–47. [CrossRef]

6. Open Street Map; Geofabrik GmbH. Map of the Canary Islands. 2019. Available online: https://www.geofabrik.de/de/index.html (accessed on 3 March 2020).
7. Grafcan. Mapas de Canarias. 2020. Available online: https://www.grafcan.es (accessed on 15 September 2020).
8. Di Maddaloni, F.; Davis, K. The influence of local community stakeholders in megaprojects: Rethinking their inclusiveness to improve project performance. *Int. J. Proj. Manag.* **2017**, *35*, 1537–1556. [CrossRef]
9. Witte, P.; Spit, T.; Delphine, D. Bridging the perception gap? When top-down built megaprojects meet bottom-up perceptions: A case study of Suramadu bridge, Indonesia. *Asian Geogr.* **2020**, 1–23. [CrossRef]
10. Gonar, H. Urbanismo impulsa el desarrollo de Santa Cruz Verde 2030. El Día 2020. Available online: https://www.eldia.es/santa-cruz-de-tenerife/2020/09/10/urbanismo-impulsa-desarrollo-santa-cruz-22344735.html (accessed on 7 December 2020).
11. Flyvbjerg, B. (Ed.) *The Oxford Handbook of Megaproject Management*; CPI Group: London, UK, 2017.
12. Moulaert, F.; Swyngedouw, E.; Rodriguez, A. Large Scale Urban Development Projects and Local Governance: From Democratic Urban Planning to Besieged Local Governance. *Geogr. Z.* **2001**, *89*, 71–84. Available online: https://www.jstor.org/stable/27818901 (accessed on 1 March 2020).
13. Hanakata, N.; Gasco, A. The Grand Projet politics of an urban age: Urban megaprojects in Asia and Europe. *Palgrave Commun.* **2018**, *4*, 1–10. [CrossRef]
14. Brookes, N. Mankind and Mega-projects. *Front. Eng. Manag.* **2014**, *1*, 241–245. [CrossRef]
15. Bruzelius, N.; Flyvbjerg, B.; Rothengatter, W. Big decisions, big risks. Improving accountability in mega projects. *Transp. Policy* **2002**, *9*, 143–154. [CrossRef]
16. Stoddart-Stones, R. Development of project management systems for major projects. *Int. J. Proj. Manag.* **1988**, *6*, 34–38. [CrossRef]
17. Oliomogbe, G.; Smith, N. Value in Megaprojects. *Organ. Technol. Manag. Constr.* **2012**, *4*, 617–624. [CrossRef]
18. Richard, L. The Emerging Role of Public–Private Partnerships in Megaproject Delivery. *Public Work. Manag. Policy* **2011**, *16*, 240–249. [CrossRef]
19. Rosol, M. On resistance in the post-political city: Conduct and counter-conduct in Vancouver. *Space Polity* **2014**, *18*, 70–84. [CrossRef]
20. Swyngedouw, E.; Moulaert, F.; Rodriguez, A. Neoliberal Urbanization in Europe: Large-Scale Urban Development Projects and the New Urban Policy. *Antipode* **2002**, *34*, 542–577. [CrossRef]
21. Cerro Santamaría, G.D. The alleged Bilbao miracle and its discontents. In *Urban Megaprojects: A Worldwide View*; Cerro Santamaría, G.D., Ed.; Emerald: New York, NY, USA, 2013; pp. 27–60.
22. Hirschman, A. *Development Projects Observed*; Brookings Institutions Press: Washington, DC, USA, 2015.
23. Locatelli, G.; Mariani, G.; Sainati, T.; Greco, M. Corruption in public projects and megaprojects: There is an elephant in the room! *Int. J. Proj. Manag.* **2017**, *35*, 252–268. [CrossRef]
24. Harvey, D. *A Brief History of Neoliberalism*; Oxford University Press: New York, NY, USA, 2007.
25. Peck, J.; Theodore, N.; Brenner, N. Neoliberal Urbanism: Models, Moments, Mutations. *Sais Rev. Int. Aff.* **2009**, *29*, 49–66. [CrossRef]
26. Carrión, A. Megaprojects and the Restructuring of Urban Governance: The Case of the New Quito International Airport. *Lat. Am. Perspect.* **2016**, *43*, 252–265. Available online: https://www.jstor.org/stable/24574859 (accessed on 2 January 2021). [CrossRef]
27. Shatkin, G. Planning Privatopolis: Representation and Contestation in the Development of Urban Integrated Mega-Projects. In *Worlding Cities: Asian Experiments and the Art of Being Global*; Roy, A., Ong, A., Eds.; Wiley-Blackwell: Chichester, UK, 2011; pp. 77–97.
28. Shatkin, G. The city and the bottom line: Urban megaprojects and the privatization of planning in Southeast Asia. *Environ. Plan. A* **2008**, *40*, 383–401. [CrossRef]
29. Vives Miró, S. Producing a "Successful City": Neoliberal Urbanism and Gentrification in the Tourist City—The Case of Palma (Majorca). *Urban Stud. Res.* **2011**, *2011*, 1–13. [CrossRef]
30. Swyngedouw, E. Post-Democratic Cities. For Whom and for What? In Proceedings of the Regional Studies Association Annual Conference, Budapest, Hungary, 24–26 May 2010.
31. Gellert, P.; Lynch, B. Mega-projects as displacements. *Int. Soc. Sci. J.* **2003**, *55*, 15–25. Available online: http://dx.doi.org/10.1111/1468-2451.5501002 (accessed on 20 December 2020). [CrossRef]
32. Winch, G. Megaproject stakeholder management. In *The Oxford Handbook of Megaproject Management*; Flyvbjerg, B., Ed.; Oxford University Press: Oxford, UK, 2017; pp. 339–361.
33. European Conference on Sustainable Cities & Towns. Charter of European Cities & Towns Towards Sustainability. 1994. Available online: https://sustainablecities.eu/fileadmin/repository/Aalborg_Charter/Aalborg_Charter_English.pdf (accessed on 11 February 2021).
34. United Nations. New Urban Agenda (Habitat III). 2017. Available online: https://uploads.habitat3.org/hb3/NUA-English.pdf (accessed on 12 February 2021).
35. Laprise, M.; Lufkin, S.; Rey, E. An indicator system for the assessment of sustainability integrated into the project dynamics of regeneration of disused urban areas. *Build. Environ.* **2015**, *86*, 29–38. [CrossRef]
36. Pediaditi, K.; Wehrmeyer, W.; Chenoweth, J. Monitoring the sustainability of brownfield redevelopment projects: The Redevelopment Assessment Framework. *Land Contam. Reclam.* **2005**, *13*, 1–11. [CrossRef]

37. Dixon, T. The Property Development Industry and Sustainable Urban Brownfield Regeneration in England: An Analysis of Case Studies in Thames Gateway and Greater Manchester. *Urban Stud.* **2007**, *44*, 2379–2400. [CrossRef]
38. Klakegg, O.J. Pursuing relevance and sustainability: Improvement strategies for major public projects. *Int. J. Manag. Proj. Bus.* **2009**, *2*, 499–518. [CrossRef]
39. Krellenberg, K.; Bergsträßer, H.; Bykova, D.; Kress, N.; Tyndall, K. Urban Sustainability Strategies Guided by the SDGs—A Tale of Four Cities. *Sustainability* **2019**, *11*, 1–20. [CrossRef]
40. ISTAC Instituto Canario de Estadística. Población Según Sexos y Grupos de Edad Grandes y Quinquenales. Comarcas por Islas de Canarias y Años. 2020. Available online: http://www.gobiernodecanarias.org/istac/jaxi-istac/tabla.do (accessed on 1 November 2019).
41. Arencibia de Torres, J. *Refinería de Tenerife, 1930–2005: 75 Años de Historia*; CEPSA: Santa Cruz de Tenerife, Spain, 2005.
42. CEOE Confederación Española de Organizaciones Empresariales. La Economía Canaria en Gráficos. 2018. Available online: https://ceoe-tenerife.com/wp-content/uploads/2019/04/2018-la-economia-canaria-en-graficos.pdf (accessed on 20 December 2020).
43. Ministerio de Fomento. Observatorio de Vivienda y Suelo. 2019. Available online: https://apps.fomento.gob.es/CVP/handlers/pdfhandler.ashx?idpub=BAW064 (accessed on 7 May 2020).
44. Hübscher, M.; Ringel, J. From one crisis to another. Tourism and housing in post-crisis Santa Cruz de Tenerife (Canary Islands, Spain). In *Sostenibilidad Turística: Overtourism vs Undertourism*; Pons, G., Blanco Romero, A.., Navalón García, R., Troitiño Torralba, L., Blàzquez Salom, M., Eds.; Monografies de la Societat d'Història Natural Balears: Palma (Illes Balears), Spain, 2020; Volume 31, pp. 283–294.
45. AbcCanarias. La Refinería de Tenerife, Entre las 200 Industrias más Contaminantes de Europa. abc.es. 2004. Available online: https://www.abc.es/hemeroteca/historico-06-03-2004/abc/canarias/la-refineria-de-tenerife-entre-las-200-industrias-mas-contaminantes-de-europa_962287394532.html# (accessed on 18 November 2019).
46. Ayuntamiento de Santa Cruz de Tenerife, CEPSA. Santa Cruz y Cepsa Sellan una Allianza para Estudiar la Transformación de la Ciudad Sobre los Terrenos de la Refinería. 2018. Available online: https://www.santacruzdetenerife.es/scverde2030/fileadmin/user_upload/web/SCverde2030/NotadePrensa26062018.pdf (accessed on 10 January 2019).
47. Gobierno de Canarias. Plan de Calidad del Aire de la Aglomeración Santa Cruz de Tenerife—San Cristobal de la Laguna, por Dióxido de Azufre. 2014. Available online: http://www.gobiernodecanarias.org/cptss/sostenibilidad/temas/planificacion-ambiental/planes_calidad_aire/ (accessed on 18 November 2019).
48. Reverón, E. La Descontaminación del Suelo de la Refinería Arrancará en Abril de 2020. El Día. 2019. Available online: https://www.eldia.es/santa-cruz-de-tenerife/2019/10/11/descontaminacion-suelo-refineria-arrancara-abril/1015680.html (accessed on 14 November 2019).
49. Hübscher, M. Zwischen Deindustrialisierung und Gentrification: Innerstädtische Großprojekte in Santa Cruz de Tenerife (Spanien). *Mitt. Osterr. Geogr. Ges.* **2020**, *161*, 63–90. [CrossRef]
50. Ramón, N. Refinería en Santa Cruz de Tenerife: Guerras y guerrillas. El Día. 2015. Available online: https://www.eldiario.es/canariasahora/premium_en_abierto/SCTF-Refineria-Guerras-guerrillas_0_449355360.html (accessed on 20 June 2019).
51. Hübscher, M.; Schulze, J.; Zur Lage, F.; Ringel, J. The Impact of Airbnb on a Non-Touristic City. A Case Study of Short-Term Rentals in Santa Cruz de Tenerife (Spain). *Erdkunde* **2020**, *74*, 191–204. [CrossRef]
52. García Hernández, J.S.; Armas Díaz, A.; Díaz Rodríguez, M.D.C. Desposesión de vivienda y turistificación en Santa Cruz de Tenerife (Canarias-España): Los desahucios a inquilinos en el barrio de El Toscal. *Bol. Asoc. Geogr. Esp.* **2020**, *87*. [CrossRef]
53. García Herrera, L.M.; Smith, N.; Mejías Vera, M.Á. Gentrification, Displacement, and Tourism in Santa Cruz de Tenerife. *Urban Geogr.* **2007**, *28*, 276–298. [CrossRef]
54. Armas Díaz, A. Reestructuración Urbana y Producción de Imagen: Los Espacios Públicos en Santa Cruz de Tenerife. Ph.D. Thesis, Universidad de la Laguna, Santa Cruz de Tenerife, Spain, 2016. Available online: http://riull.ull.es/xmlui/handle/915/2126 (accessed on 3 December 2020).
55. Rodríguez, M.D.; García Herrera, L.M.; Armas Díaz, A. Puertos y espacios públicos renovados: El puerto de Santa Cruz de Tenerife. In *XVIII Coloquio de Historia Canario-Americana*; Cabildo Insular de Gran Canaria: Las Palmas de Gran Canaria, Spain, 2008.
56. García Herrera, L.M. ¿De Cabañas a Palacios? Vivienda y Proceso de Elitización en el Cabo-los Llanos (Santa Cruz de Tenerife, Canarias). In *Scripta Nova. Revista Electrónica de Geografía y Ciencias Sociales*; Universidad de Barcelona: Barcelona, Spain, 2013; Volume 7, Available online: http://www.ub.edu/geocrit/sn/sn-146(075).htm (accessed on 10 May 2018).
57. Armas-Díaz, A.; Sabaté-Bel, F. Struggles on the Port of Granadilla: Defending the right to nature. *Territ. Politics Gov.* **2020**, 1–21. [CrossRef]
58. Littau, p. Managing Stakeholders in Megaprojects. The MS Working Group Report. 2015. Available online: https://bib.irb.hr/datoteka/768614.Managing_Stakeholders_in_Megaprojects.pdf (accessed on 27 November 2020).
59. Calvert, S. Managing Stakeholders. In *The Commercial Project Manager*; Turner, R., Ed.; McGraw-Hill: Maidenhead, UK, 1995; pp. 214–222.
60. Ferber, U.; Grimski, D.; Millar, K.; Nathanail, p. Sustainable Brownfield Regeneration. 2006. Available online: https://issuu.com/guspin/docs/nameaa6734 (accessed on 20 November 2020).
61. Hernández Sempieri, R.; Fernández Collado, C. *Metodología de la Investigación*, 5th ed.; Mc Graw Hill: Mexico City, Mexico, 2010.

62. Gill, P.; Steward, K.; Treasure, E.; Chadwick, B.L. Methods of data collection in qualitative research: Interviews and focus groups. *Br. Dent. J.* **2008**, *204*, 291–295. [CrossRef] [PubMed]
63. DiCicco-Bloom, B.; Crabtree, B. The qualitative research interview. *Med Educ.* **2006**, *40*, 314–321. [CrossRef]
64. Turner, D. Qualitative interview design: A practical guide for novice investigators. *Qual. Rep.* **2010**, *15*, 754–760. Available online: http://www.nova.edu/ssss/QR/QR15-3/qid.pdf (accessed on 5 November 2020).
65. Helfferich, C. *Die Qualität Qualitativer Daten. Manual für die Durchführung Qualitativer Interviews*, 4th ed.; VS Verlag für Sozialwissenschaften: Wiesbaden, Germany, 2011.
66. Froschauer, U.; Lueger, M. *Das Qualitative Interview. Zur Praxis Interpretativer Analyse Sozialer Systeme*, 2nd ed.; Facultas Verlags und Buchhandels AG: Vienna, Austria, 2020.
67. Flick, U. *Qualitative Sozialforschung. Eine Einführung*, 2nd ed.; Rowohlt: Reinbeck bei Hamburg, Germany, 2004.
68. Kretzer, S.; Mozygemba, K.; Heuer, J.-O.; Huber, E. Erläuterungen zur Verwendung der von Qualiservice bereitgestellten Vorlagen für die informierte Einwilligung. *Qualiservice Work. Pap.* **2020**, *2*, 1–33. [CrossRef]
69. European Parliament; European Council. General Data Protection Regulation (EU 2016/679). 2016. Available online: http://data.europa.eu/eli/reg/2016/679/2016-05-04 (accessed on 26 January 2021).
70. Mayring, p. Qualitative Content Analysis. *Forum Qual. Soc. Res.* **2000**, *1*, 1–10. Available online: http://nbn-resolving.de/urn:nbn:de:0114-fqs0002204 (accessed on 2 January 2021).
71. Schreier, M. Varianten qualitativer Inhaltsanalyse: Ein Wegweiser im Dickicht der Begrifflichkeiten. *Forum Qual. Soc. Res.* **2014**, *15*, 1–15. Available online: http://nbn-resolving.de/urn:nbn:de:0114-fqs1401185 (accessed on 2 November 2020).
72. Kuckartz, U. *Qualitative Inhaltsanalyse. Methoden, Praxis, Computerunterstützung*; Beltz Juventa: Weinheim, Germany, 2018.
73. Mayring, p. *Qualitative Content Analysis. Theoretical Foundation, Basic Procedures and Software Solution*; Beltz: Klagenfurt, Austria, 2014.
74. Hübscher, M.; (University of Leipzig, Leipzig, Germany). Interview about Santa Cruz Verde 2030/ Interviewer: M. Hübsche, Interviewee: I1 real estate expert, Unpublished Work. 23 August 2019.
75. Hübscher, M.; (University of Leipzig, Leipzig, Germany). Interview about Santa Cruz Verde 2030/ Interviewer: M. Hübscher, Interviewee: I2 Urban Planning Office, Unpublished Work. 30 August 2019.
76. Hübscher, M.; (University of Leipzig, Leipzig, Germany). Interview about Santa Cruz Verde 2030/ Interviewer: M. Hübscher, Interviewee: I4 Preservationist, Unpublished Work. 4 September 2019.
77. Burmeister, T. *Der Städtebauliche Vertrag als Rechtliches Instrument der Kooperation mit Privaten bei der Baulandentwicklung und -erschließung (PhD)*; TU Berlin: Berlin, Germany, 2003.
78. Hübscher, M.; (University of Leipzig, Leipzig, Germany). Interview about Santa Cruz Verde 2030/ Interviewer: M. Hübscher, Interviewee: I3 Real Estate Agent, Unpublished Work. 2 September 2019.
79. Hübscher, M.; (University of Leipzig, Leipzig, Germany). Interview about Santa Cruz Verde 2030/ Interviewer: M. Hübscher, Interviewee: I5 Environmental Association, Unpublished Work. 4 September 2019.
80. La Vanguardia. Resultados Elecciones Municipales 2019 en Santa Cruz de Tenerife. La Vanguardia. 2019. Available online: https://www.lavanguardia.com/elecciones/elecciones-municipales-2019/canarias/santa-cruz-de-tenerife/santa-cruz-de-tenerife (accessed on 20 December 2019).
81. Vega, G. Coalición Canaria Vuelve al Poder en Santa Cruz de Tenerife Apoyado por el PP y una Tránsfuga de Cs. El País. 2020. Available online: https://elpais.com/espana/2020-07-13/coalicion-canaria-vuelve-al-poder-en-santa-cruz-de-tenerife-tras-prosperar-la-mocion-con-el-pp-y-una-transfuga-de-ciudadanos.html (accessed on 7 December 2020).
82. Reverón, E. El Ayuntamiento Retoma el plan para Desmantelar la Refinería. El Día. 2020. Available online: https://www.eldia.es/santa-cruz-de-tenerife/2020/07/24/ayuntamiento-retoma-plan-desmantelar-refineria-22371513.html (accessed on 7 December 2020).
83. Torres, N. El PSOE Sigue Adelante con la Denuncia del Santa Cruz Verde 2030. D. De Avisos. 2018. Available online: https://diariodeavisos.elespanol.com/2018/12/el-psoe-sigue-adelante-con-la-denuncia-del-santa-cruz-verde-2030/ (accessed on 7 December 2020).
84. Braathen, E. Pac'Stão Versus the City of Police. Contentious Activism Facing Megaprojects, Authoritarianism, and Violence. *Confl. Soc.* **2020**, *6*, 145–164. [CrossRef]
85. Jordhus-Lier, D. Community resistance to megaprojects: The case of the N2 Gateway project in Joe Slovo informal settlement, Cape Town. *Habitat Int.* **2015**, *45*, 169–176. [CrossRef]
86. del Romero Renau, L.; Valera Lozano, A. From NIMBYsm to the 15M: A Decade of Urban Conflicts in Barcelona and Valencia. *Territ. Politics Gov.* **2015**, 1–21. [CrossRef]
87. Grubhauer, M. Perspektiven einer Politisierung von Planungsprozessen jenseits lokaler Mobilisierungen. Kommentar zu Lucius Burckhardts „Wer plant die Planung?". *Sub Urban. Z. Krit. Stadtforsch.* **2018**, *5*, 137–146. [CrossRef]
88. Harris, M. Megaprojects: A global review and the Australian context. *Festiv. Urban.* **2014**, 1–23. Available online: https://static1.squarespace.com/static/540680a6e4b0a7034afffb6f/t/543f572de4b0a72b21db9adc/1413437229478/Megaprojects+Review_Harris.pdf (accessed on 8 February 2021).
89. Zeković, S.; Maričić, T. Contemporary governance of urban mega-projects: A case study of the Belgrade waterfront. *Territ. Politics Gov.* **2020**, 1–22. [CrossRef]
90. Scherer, J. Olympic Villages and Large-scale Urban Development: Crises of Capitalism, Deficits of Democracy? *Sociology* **2011**, *45*, 782–797. [CrossRef]

91. Menzel, J. Wie Nachhaltig ist die HafenCity Hamburg? 2010. Available online: https://epub.sub.uni-hamburg.de/epub/volltexte/2014/28393/pdf/2010_hafencity_kurzstudie_ZR.pdf (accessed on 9 February 2021).
92. Bruns-Berentelg, J. Hafencity Hamburg—Identity, Sustainability and Urbanity. *Hafencity Discuss. Pap.* **2014**, *3*, 1–34. Available online: https://epub.sub.uni-hamburg.de/epub/volltexte/2018/80921/pdf/DP_Identity_Sustainability_and_Urbanity_final.pdf (accessed on 19 February 2021).
93. Jou, S.-C.; Lund Hansen, A.; Wu, H.-L. Accumulation by Dispossession and Neoliberal Urban Planning: 'Landing' the Mega-Projects in Taipei. In *Contradictions of Neoliberal Planning*; Tasan-Kok, T., Baeten, G., Eds.; Springer: Dordrecht, The Netherlands, 2012; pp. 151–171.
94. Waite, C. Santa Cruz Verde 2030: A New Dawn for Tenerife? *Toxic News*. 2019. Available online: https://toxicnews.org/2019/05/28/santa-cruz-verde-2030-a-new-dawn-for-tenerife/ (accessed on 14 December 2020).
95. Wochenblatt. Raffinerie: Beseitigung von Altlasten soll ab April 2020 erfolgen. *Wochenblatt* **2019**. Available online: https://www.wochenblatt.es/umwelt/raffinerie-beseitigung-von-altlasten-soll-ab-april-2020-erfolgen/ (accessed on 14 December 2020).
96. Peck, J. Neoliberalizing states: Thin policies/hard outcomes. *Prog. Hum. Geogr.* **2001**, *25*, 445–455. [CrossRef]
97. Harris, M. Competitive Precinct Projects: The Five Consistent Criticisms of "Global" Mixed-Use Megaprojects. *Proj. Manag. J.* **2017**, *48*, 76–92. [CrossRef]
98. Eskerod, P.; Huemann, M.; Savage, G. Project Stakeholder Management—Past and Present. *Proj. Manag. J.* **2015**, *46*, 6–14. [CrossRef]
99. Aaltonen, K.; Kujala, J. A project lifecycle perspective on stakeholder influence strategies in global projects. *Scand. J. Manag.* **2010**, *26*, 381–397. [CrossRef]
100. Huemann, M.; Eskerod, P.; Ringhofer, C. Rethink! Project Stakeholder Management. 2016. Available online: https://www.pmi.org/-/media/pmi/documents/public/pdf/kas/201604_huemann_rethink_project_stakeholder_management.pdf (accessed on 12 December 2020).
101. Di Maddaloni, F.; Davis, K. Project manager's perception of the local communities' stakeholder in megaprojects. An empirical investigation in the UK. *Int. J. Proj. Manag.* **2017**, *36*, 1–24. [CrossRef]
102. Clegg, S.; Biesenthal, C.; Sankaran, S.; Pollack, J. Power and sensemaking in megaprojects. In *The Oxford Handbook of Megaproject Management*; Flyvbjerg, B., Ed.; Oxford University Press: Oxford, UK, 2017; pp. 238–258.
103. Tarazona Vento, A. Mega-project meltdown: Post-politics, neoliberal urban regeneration and Valencia's fiscal crisis. *Urban Stud.* **2017**, *54*, 68–84. [CrossRef]
104. Swyngedouw, E. Interrogating post-democratization: Reclaiming egalitarian political spaces. *Political Geogr.* **2011**, *30*, 370–380. [CrossRef]
105. Megaheda, N.; Ghoneimb, E. Antivirus-built environment: Lessons learned from Covid-19 pandemic. *Sustain. Cities Soc.* **2020**, *61*, 102350. [CrossRef] [PubMed]
106. Honey-Rosés, J.; Anguelovski, I.; Bohigas, J.; Chireh, V.; Daher, C.; Konijnendijk, C. The Impact of COVID-19 on Public Space: A Review of the Emerging Questions. 2020. Available online: https://doi.org/10.31219/osf.io/rf7xa (accessed on 20 December 2020).
107. Jefferies, T.; Cheng, J.; Coucill, L. Lockdown urbanism: COVID-19 lifestyles and liveable futures opportunities in Wuhan and Manchester. *Cities Health* **2020**, 1–4. [CrossRef]
108. Sharifi, A.; Khavarian-Garmsir, A.R. The COVID-19 pandemic: Impacts on cities and major lessons for urban planning, design, and management. *Sci. Total Environ.* **2020**, *749*, 1–14. [CrossRef] [PubMed]
109. Hatef, E.; Chang, H.-Y.; Kitchen, C.; Weiner, J.; Kharrazi, H. Assessing the Impact of Neighborhood Socioeconomic Characteristics on COVID-19 Prevalence Across Seven States in the United States. *Front. Public Health* **2020**, *8*, 1–7. [CrossRef] [PubMed]
110. Martins-Filho, P.R.; de Souza Araújo, A.A.; Quintans-Júnior, L.J.; Santana Santos, V. COVID-19 fatality rates related to social inequality in Northeast Brazil: A neighbourhood-level analysis. *J. Travel Med.* **2020**, 1–3. [CrossRef]
111. Blundell, R.; Costa Dias, M.; Joyce, R.; Xu, X. COVID-19 and Inequalities. *Fisc. Stud.* **2020**, *41*, 291–319. [CrossRef]
112. Furceri, D.; Loungani, P.; Ostry, J.; Pizzuto, p. Will Covid-19 afect inequality? Evidence from past pandemics. In *Covid Economics. Vetted and Real-Time Papers*; Wyplosz, C., Graduate Institute Geneva, CEPR, Eds.; CEPR Press: London, UK, 2020; pp. 138–157.
113. Acs, G.; Karpman, M. Employment, Income, and Unemployment Insurance during the COVID-19 Pandemic. 2020. Available online: https://www.urban.org/sites/default/files/publication/102485/employment-income-and-unemployment-insurance-during-the-covid-19-pandemic.pdf (accessed on 18 December 2020).
114. Blakeley, G. Financialization, real estate and COVID-19 in the UK. *Community Dev. J.* **2020**, 1–21. [CrossRef]

urban science

MDPI

Article

Residential Segregation and Living Conditions. An Analysis of Social Inequalities in Catalonia from Four Spatial Perspectives

Joan Checa * and Oriol Nel·lo

Research Group on Energy, Territory and Society, Department of Geography, Autonomous University of Barcelona, 08193 Bellaterra, Spain; oriol.nello@uab.cat
* Correspondence: joan.checa@uab.cat

Abstract: Spatial inequalities in living conditions have traditionally been attributed to geographical location, the opposition between urban and rural settings or the size of settlements. Accordingly, the geographical literature has used these oppositions to explain not only differences in access to education, work and services but also diversity of lifestyles, beliefs and even political attitudes. In recent decades, however, urban areas have extended their scope, urbanization has become more dispersed, territories have become more interdependent and spatial hierarchies have tended to weaken. At the same time, social inequalities have become more marked, as manifested spatially by residential segregation. This article puts forward the thesis that residential segregation constitutes a considerably better explanatory factor currently for the elucidation of social inequalities and differences in living conditions in regional spaces than geographical location, the urban/rural divide or the size of settlements. A set of key indicators in the population of residents in Catalonia (level of education, socio-economic position, risk of poverty, self-perceived health and life satisfaction) are therefore analyzed from various spatial perspectives to explore this argument and evaluate each indicator's explanatory potential. The main results seem to confirm the hypothesis that the most striking spatial inequalities are associated with residential segregation.

Keywords: residential segregation; living conditions; spatial inequalities; urbanization process

Citation: Checa, J.; Nel·lo, O. Residential Segregation and Living Conditions. An Analysis of Social Inequalities in Catalonia from Four Spatial Perspectives. *Urban Sci.* **2021**, *5*, 45. https://doi.org/10.3390/urbansci5020045

Academic Editors: Juan Manuel Parreño Castellano, María José Piñeira-Mantiñán, Jesús Manuel González Pérez, David Plane and Simon Springer

Received: 24 February 2021
Accepted: 26 May 2021
Published: 31 May 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

Over the course of recent decades and, more particularly, as a result of the financial crisis that began in 2007, there has been an increase in inequalities in income and wellbeing in the populations of many developed countries. This subject has repeatedly sparked research and international debate, giving rise to some particularly influential studies [1–5]. Spain is one of the countries in the European Union in which this rise in inequalities has been most marked [6].

The increase in inequalities that has already become evident in the last twenty years of the past century in various European countries is even more striking for appearing after decades of relative progress in matters of equity. Its emergence has been attributed to a combination of various factors: the crisis of the welfare state [7], asymmetry in the mobility of capital and labour [8], the generalization of neoliberal policies [9], the growing incompatibility between capitalist economies and democratic institutions [10] and the effects of economic globalization [4]. In this context, the COVID-19 pandemic will very likely trigger an increase in inequality from the year 2020 onwards, on both a global and a national level, for two reasons: on the one hand, the pandemic will probably give rise to an increase in global poverty [11] and, on the other hand, inequality is itself a coadjutant in the expansion of the pandemic [12].

The debate on inequalities has acquired greater visibility in recent years due to an upsurge in political attitudes and behaviours of a disruptive nature in many European cities and countries [13–19]. These attitudes and behaviours express the dissatisfaction and fears of large sections of the population about the social and urban transformations that

are occurring, as well as the policies that have accompanied them [20]. Changes in political attitudes have been apparent over the last decade in various episodes with widely varying characteristics. The most visible examples are the resistance to the imposition of austerity measures in various European countries at the high point of the financial crisis (Greece, Spain, Portugal), the emergence of the "gilets jaunes" movement in France and independence movements in other territories (Scotland, 2017; Catalonia, 2017). This unrest has been expressed electorally in a number of different ways. On the one hand, it has sparked the upsurge of newly minted political forces that challenge the traditional parties (Syriza in Greece, Podemos in Spain) and, on the other hand, it has driven the renewal of parties and movements on the far right (now represented in many national parliaments and governments of several European countries). Similarly, there have been referendums that have produced results which clearly alter the status quo (on Brexit in the United Kingdom and on constitutional reform in Italy, both in 2016).

This motley collection of phenomena displays a complexity that defies any simplification, be it the exaltation in some quarters of an upsurge in pure civic dynamism destined to advance progressive policies "from the bottom up" or the forthright condemnations emanating from other sectors, complete with labels such as "populism" and "irrationalism". In any case, these changes in political attitudes represent one of the most significant phenomena in the recent development of contemporary European societies, due to both the contradictions that they embody and the historical consequences that they could entail [18].

Various authors who have closely examined these phenomena have emphasized the importance of territorial variables in the evolution of social conflict and political discontent. Accordingly, the origins of these developments have been sought in, for example, the opposition between the "France péripherique" and the Parisian metropolis [13]; between Britain's old industrial hinterlands and the great tertiary hub of London [15,21]; between the Italian *mezzogiorno* and the better-off regions in the north and centre of the country; or between "Empty Spain" and the metropolitan areas [22]. From the spatial viewpoint, therefore, discontent could be interpreted, to a certain extent, as "the revenge of places that do not matter" [15], making it more the result of specific territories' feelings of resentment than of social inequalities in themselves.

This debate is directly linked to a perennial topic in geographical analysis: the effects of territorial diversity on a population's living conditions. As already known, there is an extensive body of research on this subject that responds to diverse approaches and themes. These include economic analyses on the factors that affect regional disparities [23–25], works on the causes and consequences of urban segregation [26–31], debates on the geography of opportunities and the neighborhood effect [32–35] and critical essays on uneven development and the demand for spatial justice [36–42].

One of the main questions addressed in this debate is precisely which factors explain, on the one hand, discrepancies in access to education, income, work or services and, on the other hand, diversity in lifestyles, beliefs and even political attitudes. Geographic tradition attributed these disparities to regional peculiarities and *genre de vie* [43], the opposition between urban and rural areas [44] or the settlements' population size [45]. However, in Europe in recent decades, extended urbanization [46,47], the spread of urban networks over the territory [48] and the relative weakening of spatial hierarchies within regions [49] have highlighted the conceptual inadequacy of those approaches and the need to address the issue from other perspectives.

The present contribution explores precisely this question, starting from the hypothesis that the key factors for explaining spatial inequalities in living conditions are not to be found in the classic territorial oppositions but rather in residential segregation. Thus, the territorial factor that would most clearly impinge upon the maintenance and reproduction of social inequalities—on the basis of income or origin, on both an urban and a regional scale—would be, above all else, the tendency of social groups to fracture. Far from being a matter of solely analytical importance, the clarification of the question is, in our opinion,

of great significance when it comes to elucidating the causes of social discontent to which we have referred above.

We define residential segregation herein as the tendency of social groups to separate from each other in urban areas according to their capacity to choose a place of residence. As is well known, this capacity depends mostly on two factors: on the one hand, disposable income and, on the other, real estate prices [29,30,38,50,51]. Under these circumstances, the most disadvantaged groups tend to concentrate in those areas where the low quality of housing, lack of amenities and/or scarcity of public services make prices relatively lower. In contrast, households that are more affluent, and thus able to choose their place of residence more easily, also tend to group together to enjoy the benefits of living among their peers and take advantage of better services. Recent studies have shown how growing income inequalities are leading to rising levels of urban socioeconomic segregation almost everywhere in the world, and more specifically in the main European cities [31,52]. In this context, one of the factors that can contribute to this increased segregation is the distribution of social housing in urban areas or, as in the case we studied, the ineffectiveness of social housing policies [53–55].

The discussion draws on research into the specific case of Catalonia in the first two decades of the 21st century. This case is particularly interesting for two reasons. First, the urbanization process has given rise to strong contrasts in this region of southern Europe: thus, more than two-thirds of the Catalan population—5 million out of 7.5 million inhabitants—reside in the metropolitan area of Barcelona, which covers barely 10% of the 32,000 sq. km that make up the region's total surface area [56]. Furthermore, in the last few decades Catalan society has experienced deep transformations that have radically altered its economic base (an ongoing transition from industry to services), modified its social structure (reduced importance of traditional social classes) and sparked strong migratory flows [57,58]. In the last ten years, moreover, these transformations have been accompanied by highly significant social and political instability [59,60].

The method used here to examine this issue involved, firstly, the selection of a series of social indicators related to the living conditions of the population resident in Catalonia. These indicators are then analysed in terms of four different spatial aggregations of the data: geographical setting, population size, the intensity of urbanization and the effect of urban segregation. It is then demonstrated that the latter variable proves most discerning when it comes to explaining the territorial factors that impinge upon people's lives. An initial processing of the data presented below was undertaken within the framework of the Report on Social Cohesion in Catalonia [60]. The methodology adopted partly follows that used in [14].

On the basis of the proposed objectives, hypothesis and methodology, this study is divided into four sections: the present introduction; a brief methodological epigraph with specifications of the data used and the type of analysis conducted; an explanation and discussion of the results obtained and, finally, a synthesis and some brief conclusions.

2. Materials and Methods

Two key elements need to be determined in an examination of the spatial distribution of social inequality: on the one hand, the variables selected as indicators of living conditions and, on the other hand, the territorial aggregations used to analyse them. As mentioned above, in this study we evaluated various indicators related to people's living conditions according to their place of residence in the Catalan territory, and we systematically compared several territorial groupings of the data. The indicators used came from the processing of the Survey of the Population's Living Conditions and Habits (ECVHP) corresponding to the year 2011.

The ECVHP drawn up by the Institut d'Estudis Regionals i Metropolitans de Barcelona (IERMB) and the Institut d'Estadística de Catalunya (IDESCAT) has a five-year periodicity. The 2011 version used here covered the entire territory of Catalonia with an effective sample of 4235 households (sample units) distributed between 529 census tracts,

resulting in a sample of 10,604 individuals (8000 of them aged 16 and over). Sampling errors for Catalonia as a whole were ±1% for individuals and ±1.5% for households. Even though in most cases the sample does not permit any greater disaggregation for statistical exploitation, it is sufficient in size for the purposes of this analysis. A Table S1 indicating the number of records included in each variable and spatial aggregation has been added to the Supplementary Materials to demonstrate the representativeness of the sample. This version was chosen for two reasons: on the one hand, it presents a complete set of data related to residential segregation, as shown more fully below; on the other hand, it evidences the structural nature of territorial inequalities, which was present prior to the crisis situations of the last decade and continued throughout them. Furthermore, although there have been more recent surveys, these do not present a sufficient sample to analyse the whole of the territory of Catalonia and the different territorial aggregations proposed. For details of the methodology of the ECVHPC, see [61]. More specifically, we selected the following five variables (in each, the treatment of the variables and subdivisions of the data responds to the desire to achieve the best possible balance between the sample size of the survey data and the objective of the study):

- *Level of completed studies*. Official level of education acquired by individuals aged 25 or over. Two groups were differentiated: the population with higher education and the population without.
- *Social structure*. Social structure for the working population aged between 16 and 64, in accordance with the criteria of the European Socio-Economic Classification (ESEC 9 + 1). Social strata were classified on the basis of groupings of jobs (i.e., occupational strata). Two groups were constructed for the purposes of our analysis: a qualified group (ESEC = 1, 2 and 3) and the rest of the population (ESEC > 3). ESEC 1, 2 and 3 correspond to the categories: large employers and higher-grade professional, administrative and managerial occupations; lower-grade professional, administrative and managerial occupations; and higher-grade white-collar workers. For more details of this classification, see [36].
- *Rate of risk of poverty in the population.* Percentage of people who are below the poverty level in the absence of any social transfers, other than retirement and subsistence payments. This threshold is established as 60% of people's median income per consumption consumer unit (equivalized household size). Two groups were differentiated: those at risk of poverty and those not at risk.
- *Self-perceived health*. Subjective perception of individuals' state of health, for the population aged 16 and over. Two groups were differentiated: those who state that they enjoy a good or very good state of health, and those who say that they are in a middling, bad or very bad state.
- *Overall life satisfaction*. Subjective perception of the life satisfaction of people aged 16 and over. A scale running from 0 to 10 is used to evaluate the degree of satisfaction (0 = total dissatisfaction; 10 = total satisfaction).

As mentioned above, these variables have been analysed with respect to four territorial aggregations established according to criteria of: geographical location, population size, intensity of urbanization and social vulnerability. The following four groupings were used for this purpose.

- *Planning settings*. Spatial planning areas currently used in Catalonia: Metropolità, Comarques Gironines, Camp de Tarragona, Terres de l'Ebre, Ponent and Alt Pirineu-Aran, Comarques Centrals and Penedès [62]. To make the sample more representative, the settings of Ponent and Alt Pirineu-Aran were combined into one.
- *Size of population*. Classification of the totality of the municipalities of Catalonia according to the number of inhabitants registered in the population census, in keeping with data from the Institut Català d'Estadística (IDESCAT) Continuous Census of Inhabitants. The municipalities were divided according to the following pattern: less than 5001 inhabitants; between 5001 and 10,000 inhabitants; between 10,001 and 50,000

inhabitants; between 50,001 and 100,000 inhabitants; more than 100,000 inhabitants and the city of Barcelona.

- *Degree of urbanization*. Classification of the Catalan territory into three categories defined on the basis of each municipality's population density and its contiguity with other settlements, following the method established by the sociologist Sergio Porcel, already applied to the analysis of the surveys of young people in Catalonia in 2012 and 2017 [14,63]. The categories were as follows: densely populated area (bounded by a contiguous set of municipalities, each with a density > 500 inhabitants per km^2, and an overall combined population > 50,000 inhabitants); semiurban or intermediate area (contiguous set of municipalities that do not belong to a densely populated area, in which each municipality has a density > 100 inhabitants per km^2 and the overall combined population > 50,000 inhabitants or is adjacent to a densely populated area) and barely populated area (a set of municipalities that do not form part of either a densely populated area or an intermediate area and are therefore markedly rural in nature).
- *Intensity of residential segregation*. Classification of Catalonia's census tracts with a focus on four variables closely linked to income: percentage of foreign population; percentage of population in a situation of unemployment; mean surface area of residence and cadastral value of residence. This analysis led to a division of the census tracts into three categories related to income: those with extreme downward urban segregation (vulnerable neighbourhoods, 484 census tracts); those with extreme upward urban segregation (well-off neighbourhoods: 586 census tracts) and those with no extreme segregation (intermediate neighbourhoods, 4359 census tracts). This classification was established in the research *Barrios y crisis*, corresponding to 2012 [64].

These territorial aggregations allow us to classify the population of Catalonia in accordance with the settings and population numbers shown in Table 1 and Figure 1. It should be pointed out that in all the aggregations, the resulting settings present a considerable volume of population (the least populated, Terres de l'Ebre, has 191,631 inhabitants), guaranteeing a suitable level of statistical representativity.

Table 1. Distribution of the population according to territorial aggregations. Catalonia, 2011.

Planning settings	Metropolità	Comarques Gironines	Camp de Tarragona	Terres de l'Ebre	Ponent and Alt Pirineu i Aran	Comarques Centrals	Penedès	**Total**
	4,636,077	741,899	518,655	191,631	443,211	405,489	602,656	7,539,618
Population size	Up to 5000 inhabitants	From 5001 to 10,000 inhabitants	From 10,001 to 50,000 inhabitants	From 50,001 to 100,000 inhabits	More than 100,000 inhabits	Barcelona	**Total**	
	790,319	645,951	2,097,920	1,056,294	1,333,687	1,615,448	7,539,618	
Degree of urbanization	Densely populated area	Semiurban or intermediate area	Sparsely populated area	**Total**				
	6,087,671	818,436	633,511	7,539,618				
Segregation	Vulnerable setting	Nonvulnerable setting	Well-off setting	**Total**				
	676,365	6,239,062	624,191	7,539,618				

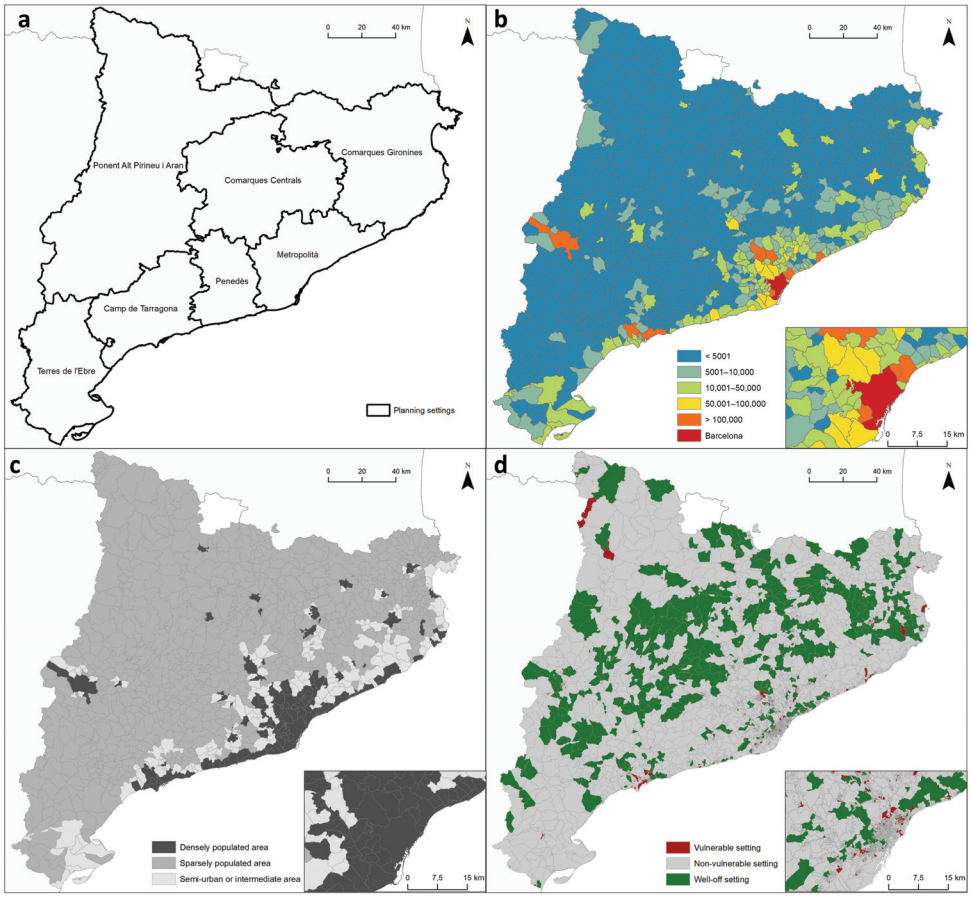


Figure 1. Territorial settings, Catalonia. (**a**) Planning settings; (**b**) Population size; (**c**) Urban/rural character; (**d**) Residential segregation. Source: In-house construction based on cartography from Institut Cartogràfic i Geològic de Catalunya, inhabitants data from (IDESCAT), Urban/rural character from [14,63] and Residential segregation from [64].

3. Results

The results obtained from the analysis of the five variables confirm (albeit with some variations) the initial hypothesis. They show that, from the territorial point of view, the most striking social cleavages or inequalities correspond less to the geographical setting of reference, the population size or intensity of urbanization and more to residential segregation. Let us examine these results in detail.

3.1. Level of Studies Attained

Spatial factors are a crucial element in the debate about the social potentialities of the educational system. More particularly, access to higher education has traditionally been considerably more onerous and difficult for the population resident in areas far removed from major urban centres, where the main educational facilities and universities tend to be established [65]. Furthermore, some recent studies in Catalonia and other contexts have shown that training opportunities are heavily determined by the prevailing socioeconomic level of the residence area [66–68]. This circumstance is reflected by the phenomenon of scholastic migration (enrolment outside the neighbourhood or municipality of residence),

which is widespread in Catalonia [69,70]. Accordingly, any study of spatial inequalities demands a close examination of the main differences to be found in the field of education.

Figure 2 shows the data related to the level of higher education attained by the Catalan population aged 25 and over, grouped in accordance with the four territorial categories used herein (geographical setting, population size, intensity of urbanization and vulnerability). As we can see, the mean of the Catalan population with higher education is 28%. It is immediately apparent, however, that there are significant differences between the various territorial areas, and a comparison between the main geographical settings reveals that the percentage of the population with higher education is greater in the more urbanized areas: the Metropolitan Region of Barcelona, in first place, closely followed by Penedès and the Camp de Tarragona. In contrast, Comarques Centrals and Terres de l'Ebre present much lower values—in fact, the percentage of the population with higher education resident in the Metropolitan Region of Barcelona is twice that of Terres de l'Ebre. It must be taken into account, however, that educational itineraries depend not only on family income and the educational facilities on offer in each territory but also on other factors, such as the economic dynamism, the relative weight of the economic sectors and the qualification requirements of the labour market, as well as sociocultural factors derived from the characteristics of places of residence [14]. The fact that the area of Ponent and Alt Pirineu-Aran has double the percentage of population with higher education than Terres de l'Ebre, even though both are far from the metropolitan area of Barcelona, confirms the difficulty inherent in any automatic co-opting of geographical proximity to major urban centres as the primary explanatory factor in this field.

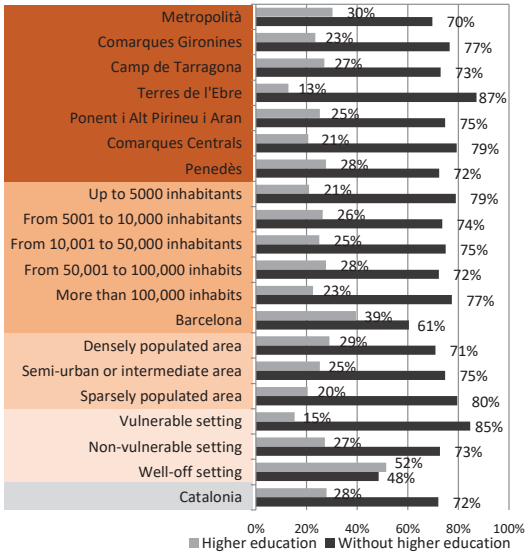


Figure 2. Level of studies attained. Catalonia, population aged 25 years and over. Year 2011. Source: In-house construction based on the ECVHP, 2011.

An examination of the data related to the level of studies attained by the population according to the size of the place of residence leads to similar conclusions. Firstly, there is a strong contrast between the city of Barcelona, where 4 out of every 10 adult residents have a higher education, and places with less than 5001 inhabitants, which have barely half that proportion. This difference can probably be explained by the broad range of education available in the capital, along with a labour market with jobs requiring a high level of qualification and the subsequent displacement of people with a higher education to Barcelona, attracted by the specialist work on offer. Close examination of the data reveals,

however, that the population size of the municipality of residence is not directly related to the level of studies. Thus, the percentage of the population with a higher education in places with 5001 to 100,000 inhabitants exceeds, in every case, that of residents in cities with more than 100,000, with the exception of Barcelona. The fact that places with less than 5001 inhabitants and more than 100,000 share the bottom ranking in higher education shows that the size of the place of residence has a limited explanatory capacity in this respect.

Something similar occurs with the intensity of urbanization, or what has come to be known as the urban/rural divide. It has traditionally been understood that rurality is one of the main obstacles for access to education in general, and higher education in particular. The data demonstrate, however, that in the Catalan case, the differences in the classification of places according to the urban/rural divide are smaller than in any of the other aggregations used. Although it is true that the population residing in sparsely populated areas is less likely to attain a higher education than that residing in densely populated areas, the difference is far from overwhelming.

In contrast, the differences associated with residential segregation seem more conclusive. While one out of every two adults residing in well-off areas has attained a higher education, among residents in vulnerable areas, this proportion is barely more than one in every seven. This was the greatest difference found in all the classifications examined, markedly greater than any differences derived from the geographical areas, the population size or the degree of urbanization. Residential segregation therefore seems to be the dimension that is most clearly related with the attainment or otherwise of a higher education—and the dimension that most determines and best reflects that attainment.

3.2. Social Structure

As explained above, the structure of Catalan society has undergone decisive transformations in recent decades [57,58]. An examination of the distribution of social groups in the Catalan setting reveals data that complement the findings above, although the data used here to observe this distribution are inevitably more limited in scope. As explained in the Methodology section, we used the European Socio-Economic Classification, constructed on the basis of occupational categories, to differentiate between two groups: the population with jobs requiring qualifications (ESEC = 1, 2 and 3) and the rest of the population (ESEC > 3).

The data show in Figure 3 that the more qualified job categories cover slightly more than a quarter of the working population of Catalonia (27.7%, to be precise). Unsurprisingly, their territorial distribution follows a pattern similar to that of the level of higher education: the geographical area that presents the highest proportion of higher-level employment categories is the Metropolitan Region of Barcelona - obviously heavily affected by the presence of the capital city - where they have double the weight that they have in Terres de l'Ebre and Comarques Centrals. The inequalities associated with population size and the intensity of urbanization are almost identical to the values observed in the previous variable.

Once again, it is the spatial aggregation corresponding to residential segregation that presents the most striking inequalities, even more than in the case of the distribution of higher education. Whereas five out of every ten working people that live in well-off areas belong to higher qualified employment categories, in vulnerable areas, this proportion is just over 1 out of every 10.

3.3. Risk of Poverty

One of the most notable effects of the financial crisis that began in 2007—and the policies that have accompanied it—has been the increase in the population at risk of poverty, or already in a situation of poverty [71–73]. The current health and social crisis triggered by the COVID-19 pandemic will probably worsen this situation, both globally and locally [11].

The data presented below (Figure 4) indicate the percentage of the Catalan population living in consumption units with earnings below the threshold of 60% of the mean income in Catalonia (before social transfers, apart from pensions and subsistence payments). The data have the disadvantage of being calculated on the basis of thresholds homogenized for

the whole of Catalonia, even though incomes and costs of living are relatively different in the various parts of the region. In this sense, the areas that tend to have higher average incomes due to their position in the urban system of Catalonia show apparently better results compared to the whole, although the costs of living there are comparatively higher. In contrast, the territories with low mean incomes occupy the bottom positions with respect to these parameters, even though their situation is alleviated by lower living costs. In any case, this variable also offers an interesting approach to spatial differences.

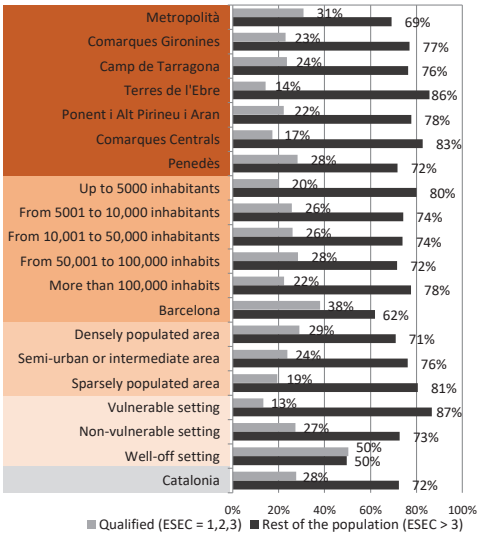


Figure 3. ESEC (9 + 1) social structure. Working people aged from 16 to 64 years, Catalonia. Source: In-house construction based on the ECVHP, 2011.

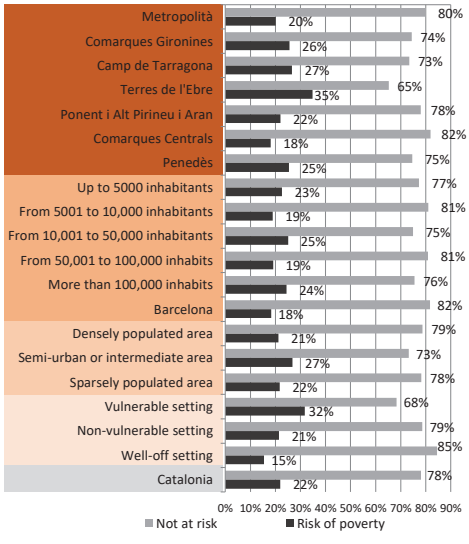


Figure 4. Levels of risk of poverty. Percentage of population resident in consumption units with incomes lower than 60% of the mean. Catalonia, 2011. Source: In-house construction based on the ECVHP, 2011.

The principal finding is that, according to the data of the ECVHP 2011, the poverty rate was 21.9% in the population of Catalonia—or, in other words, one out of every five citizens found themselves in a situation of poverty. Any comparison between territorial settings must be approached, however, with the aforementioned caveat that the mean levels of income and costs of living are far from homogeneous. As we can see in Figure 4, Terres de l'Ebre is, once again, the setting with the highest poverty rate, with almost 35% of its population affected. It is followed by Camp de Tarragona, Comarques Gironines and Penedès, all at around 25%. The areas with the lowest poverty rates are Ponent and Alt Pirineu-Aran and Comarques Centrals, while that of the Metropolitan Region of Barcelona lies around the mean for Catalonia.

The data linking the poverty rate to population size and intensity of urbanization are relatively less affected by the biases associated with the assessment of a single threshold for the whole of Catalonia—and they are, therefore, ultimately more interesting. In terms of population size, the city of Barcelona presents the lowest poverty rate, but, leaving aside the case of the capital, it can be seen that poverty is not directly or unequivocally related to population size. The same is true in terms of data referring to the intensity of urbanization. The territories with the highest percentage of poverty are those with an intermediate degree of urbanization and the differences between areas with high and low intensities of urbanization are not excessively marked.

The absence of any clear relationship between these spatial variables and situations of poverty contrasts strikingly with the results of an analysis of spatial aggregation on the basis of the level of residential segregation. It is abundantly clear that the population living in vulnerable settings is over two times more likely to find itself in a situation of poverty than that of well-off settings: in the former, one in every three people find themselves in that situation, while in the latter this proportion is barely one in seven. It must be borne in mind, however, that in this case the results may be tautological to a certain extent, since the variables used to construct the classification of the census tracts into vulnerable, well-off and intermediate settings (i.e., percentage of population unemployed, percentage of foreign population, cadastral value and mean surface area of residence) are closely related to income.

3.4. Self-Perceived Health

Having analyzed the indicators related to life opportunities, employment and poverty, we can go on to examine the issue of spatial inequalities via another variable directly related to living conditions: the state of health. Experts in public health have reliably explained how personal inequalities in health are systematic and produced—and reproduced—socially and spatially [74–77]. Once again, the present circumstances associated with the COVID-19 pandemic seem to clearly confirm the relationship between the health status of the population and social cleavages [12,78]. Accordingly, health is not a vector that only affects individuals through particular genetic factors but is in fact closely linked to their living conditions—and these, in their turn, largely depend on social and spatial factors such as working conditions, mobility, housing and environment.

What needs to be unpicked here is whether or not these factors are more decisive when they are analyzed in terms of geographical areas, population size, intensity of urbanization, or residential segregation. Territorial differences in health are usually discussed on the basis of mortality rates and life expectancy, with a view to establishing these factors' relationships with socio-economic and work-related circumstances, as well as material deprivations. We follow a less well-trod path herein by examining the self-perceived health of individuals aged 16 years and over—an indicator that covers subjective experience of not only illness but also sensations like exhaustion [79]. In particular, as mentioned above, we have used the ECVHP data on self-perceived health to establish two categories: one of people who declare their state of health to be very good or good and the rest of the population (i.e., people who, according to their own subjective perception, have a state of health that is middling, bad or very bad).

In this case, the data in Figure 5 show biases that can be partly attributed not so much to spatial factors but more to the age structure of the population resident in each area. Thus, territories that have, on average, a more elderly population than that of Catalonia as a whole—as in the case of Ponent and Alt Pirineu-Aran and Terres de l'Ebre, as well as towns with under 5000 inhabitants and sparsely populated areas—present a poorer state of self-perceived health than the rest. Beyond these extremes, however, the differences between settings—whether classified by geographical area, population size or intensity of urbanization—are not very significant. Neither are the differences between the vulnerable and the well-off settings particularly marked, although the latter, as expected, present a notably better state of self-perceived health.

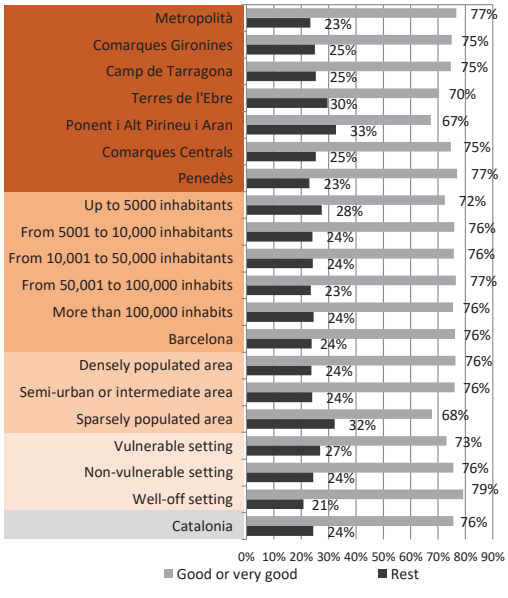


Figure 5. Self-perceived health. Population aged 16 years and over. Catalonia. Source: In-house construction based on the ECVHP, 2011.

It would surely be possible to obtain more conclusive results with other indicators (such as life expectancy and specific diseases) and adjustments to the scales of analysis to avoid biases such as age structure [80,81] but these steps would take us beyond the remit of this study.

3.5. Life Satisfaction

The last variable that we studied was subjective life satisfaction. As mentioned above, the data from the ECVHP reflect the subjective perception of life satisfaction in individuals aged 16 and over, using a scale of degree of satisfaction from 0 to 10, with 0 corresponding to the lowest level of satisfaction and 10 to the highest.

The mean life satisfaction of the Catalan population is fairly high, at around 7.33 (see Figure 6). In this case, the differences with respect to the urban/rural divide are almost irrelevant, as they barely stray from the mean. In contrast, the differences in the classification by population size are more significant, although, even here, there is no clear pattern that makes it possible to relate the two variables. Similarly, although the differences between large geographical settings are relatively more substantial, no logical order can be deduced from them. Once again, the difference that is surely most significant and explanatory is that between the life satisfaction of residents of well-off settings and those of vulnerable settings. In fact, if we leave aside the contrasts between some of the

geographical settings, this difference is the most marked of all, and the one that affects most people.

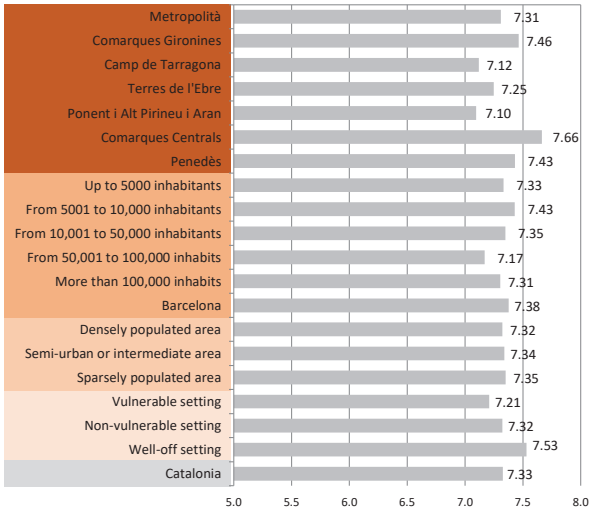


Figure 6. Life satisfaction. Population aged 16 and over. Catalonia. Source: In-house construction based on the ECVHP, 2011.

4. Synthesis and Conclusions

Our study seeks to contribute to our knowledge of the relationship between spatial variables and a population's living conditions. Using the specific example of Catalonia, we have analysed the relationship between, on the one hand, the population's place of residence and, on the other, a set of social indicators (level of education, socioeconomic position, the risk of poverty, self-perceived health and life satisfaction). To do this, Catalan localities were grouped into four different territorial aggregations that corresponded to geographical settings, population size, intensity of urbanization and residential segregation. The objective was to determine which of these aforementioned spatial factors is most relevant to an explanation of the differences in people's life courses and living conditions, and, therefore, the social cohesion of the country.

The data presented suffer from limitations of spatial and sampling representation that make deeper statistical analysis difficult. In our opinion, however, they show the interest and need to continue exploring the relationship between social inequality and territory, both in Catalonia and in all the countries of the European Union. Other data sources that allow a more in-depth and comparative statistical analysis will be necessary for this.

The results obtained are summarized in Table 2 and in the maps included in the Supplementary Materials. For the purposes of comparison, we have set the values of each of the variables analysed as index numbers (Catalonia = 100) and calculated the mean deviations of the observations. This makes it possible to contrast the deviations obtained in each of the territorial treatments of the data, so that the higher the deviation, the more discriminating the proposed spatial aggregation with respect to social inequalities. As can be seen, the results proved quite illustrative and they enable us to confirm, to a large extent, the initial hypothesis of substantial territorial fractures and differences in Catalonia. However, rather than being related to the variables around which the debate on this issue have traditionally revolved—geographical location, population size and the intensity of urbanization—these differences are linked, above all else, to individuals' and social groups' spatial segregation according to their income.

Table 2. Summary of the indicators analysed and their deviations. Catalonia; base: 100.

Index Indicators 100		Level of Completed Studies (Aged 25 or over)		Self-Perceived Health of People Aged 16 and over		Overall Life Satisfaction of People Aged 16 and over	Rate of Risk of Poverty 60% Median—Total CAT		Social Structure ESEC (9 + 1) People Aged 16 and over		Mean Indices	Sum Mean Deviations	Mean
		Without Higher Education	Higher Education	Rest	Good or Very Good	From 0 to 10	Not at Risk	Risk of Poverty	Qualified (ESEC = 1,2,3)	Rest of the Population (ESEC > 3)			
Spatial planning areas	Metropolità	96.8	108.4	95.5	101.4	99.8	102.3	91.8	111.4	95.6	100.3		
	Comarques Gironines	106.2	84.0	102.5	99.2	101.9	95.3	116.9	83.1	106.5	99.5		
	Camp de Tarragona	101.3	96.7	103.6	98.8	97.2	94.0	121.4	85.0	105.7	100.4		
	Terres de l'Ebre	121.0	45.9	121.4	93.1	98.9	83.5	159.0	52.0	118.4	99.2		
	Ponent i Alt Pirineu i Aran	103.7	90.4	133.8	89.1	96.8	99.8	100.5	80.5	107.5	100.2		
	Comarques Centrals	110.0	74.1	103.7	98.8	104.6	104.9	82.7	62.3	114.4	95.1		
	Penedès	100.4	99.0	94.4	101.8	101.4	95.5	116.0	101.8	99.3	101.1		
	Mean Deviation	6.5	16.9	10.7	3.5	2.2	5.6	19.9	21.5	8.2		94.95	10.55
Population size	Up to 5000 inhabitants	109.6	75.3	112.7	95.9	100.1	99.0	103.4	72.1	110.7	97.6		
	From 5001 to 10,000 inhabitants	102.1	94.5	98.6	100.5	101.4	103.8	86.5	93.0	102.7	98.1		
	From 10,001 to 50,000 inhabitants	104.0	89.7	99.3	100.2	100.3	95.9	114.6	94.0	102.3	100.0		
	From 50,001 to 100,000 inhabits	100.2	99.4	96.2	101.2	97.9	103.6	87.2	102.9	98.9	98.6		
	More than 100,000 inhabits	107.4	80.8	100.3	99.9	99.7	96.7	111.7	80.9	107.3	98.3		
	Barcelona	83.9	141.5	97.4	100.8	100.7	104.6	83.5	137.4	85.7	104.0		
	Mean Deviation	6.6	17.0	3.6	1.2	0.8	3.4	12.1	16.7	6.4		67.68	7.52

Table 2. *Cont.*

Index Indicators 100		Level of Completed Studies (Aged 25 or over)		Self-Perceived Health of People Aged 16 and over		Overall Life Satisfaction of People Aged 16 and over	Rate of Risk of Poverty 60% Median—Total CAT		Social Structure ESEC (9 + 1) People Aged 16 and over		Mean Indices	Sum Mean Deviations	Mean
		Without Higher Education	Higher Education	Rest	Good or Very Good	From 0 to 10	Not at Risk	Risk of Poverty	Qualified (ESEC = 1,2,3)	Rest of the Population (ESEC > 3)			
Degree of urbanization	Densely populated area	98.4	104.0	96.9	101.0	99.9	100.8	97.1	104.9	98.1	100.1		
	Semiurban or intermediate area	103.8	90.3	98.1	100.6	100.2	93.8	122.2	86.1	105.3	100.0		
	Sparsely populated area	110.4	73.1	131.8	89.7	100.3	100.2	99.3	70.3	111.4	98.5		
	mean deviation	5.3	13.6	12.3	4.0	0.2	2.4	8.6	16.2	6.2		68.61	7.62
Segregation	Vulnerable setting	117.6	54.7	110.3	96.7	98.4	87.5	144.7	48.0	119.9	97.5		
	Nonvulnerable setting	100.9	97.7	100.1	100.0	99.9	100.6	97.8	98.7	100.5	99.6		
	Well-off setting	67.3	184.5	85.2	104.8	102.8	108.3	70.6	181.9	68.6	108.2		
	Mean Deviation	17.1	44.1	8.4	2.7	1.5	7.1	25.4	45.1	17.3		168.67	18.74
	Mean Catalonia	100	100	100	100	100	100	100	100	100	100		

Source: In-house construction based on the ECVHP, 2011.

Thus, in three of the five variables studied—level of studies, socioeconomic position and risk of poverty—the greatest differences are clearly seen in those categories associated with residential segregation. In the other two variables—self-perceived health and life satisfaction—there was greater dispersion related to the geographical settings and other factors such as the mean age of the population. It is significant that the more structural variables seem to be more closely linked to residential segregation, while the differences associated with population size and the traditional urban/rural divide are, generally speaking, less relevant.

If we add the mean deviations associated with each of the spatial aggregations to achieve a synthesis value, we can see how the highest value is the one derived from the territorial grouping based on residential segregation—so much so that the mean of the mean deviations resulting from the analysis of segregation is practically double the means associated with the analysis via geographical settings, population size or degree of urbanization.

The enhanced capacity of residential segregation to explain spatial inequalities is also reflected in the interrelationship between the various variables in each of the territorial aggregations. Thus, the ordering of the variables in the three categories associated with residential segregation always follows the same ordinal precedence, so vulnerable areas are always in the worst position with respect to each of the variables. However, in the other territorial aggregations—geographical areas, population sizes and intensity of urbanization—the behaviour of the variables is more erratic, and their mutual coherence is lower. Spearman's correlation analysis fully confirms this reading, as can be seen in Table S2 included in the Supplementary Materials.

We can conclude, therefore, with the following premises that largely confirm our initial hypothesis:

(1) In Catalonia, there are notable inequalities in the average living conditions of people residing in various parts of the territory. These inequalities can be confirmed by examination of variables such as level of education, socioeconomic position, risk of poverty, health condition and life satisfaction.
(2) The data available seem to ratify the statement repeatedly found in the literature, according to which the place of residence has a two-pronged effect on the opportunities and living conditions of the population: on the one hand, social differences influence the capacity of individuals, families and social groups to settle and use different territories; on the other hand, the population's distribution over the space helps to consolidate and reproduce social differences.
(3) The variables that present the most marked spatial differences are, in the following order: the socioeconomic position of the working population, the level of studies attained and the risk of poverty.
(4) The analysis of social variables by grouping localities according to their size and intensity of urbanization (reflecting what is traditionally known as the urban/rural divide) has very little discriminatory and explanatory capacity. This finding has important implications, as the size of localities and rurality have traditionally been used as reference points for the analysis and discussion of spatial inequalities, and they underlie both common perceptions and territorial debates, both in Catalonia and beyond.
(5) The grouping of localities according to large geographical areas proves to be somewhat more significant. However, the differences between these settings are particularly relevant with respect to variables with a subjective component (such as self-perceived health and life satisfaction) and, furthermore, they are difficult to reduce to simplistic opposites such as coast/interior, mountain/plain or metropolitan/non-metropolitan.
(6) In any case, the most striking spatial inequalities are those associated with residential segregation. Thus, the most important territorial fractures in key variables such as the level of studies or socioeconomic position are to be found between the well-off and vulnerable settings.

These results contain relevant policy implications. In particular, they suggest that to reduce spatial inequalities today, improving living conditions in the most vulnerable

neighbourhoods and urban areas must be a priority. Obviously, the characteristics of the case under study cannot necessarily be extrapolated to other regions of Spain and Europe. However, the results obtained clearly show the need to consider residential segregation and its effects as key factors in academic and political debates about spatial cleavages.

Supplementary Materials: The following are available online at https://www.mdpi.com/article/10.3390/urbansci5020045/s1, Table S1: Distribution of the sample according to territorial aggregations, Table S2: Spearman's correlation according to territorial aggregations, Figure S1: Percentage of population (aged 25 or over) without higher education according to Territorial settings, Catalonia, Figure S2: Percentage of population (aged 16 and over) with self-perceived health no good according to Territorial settings, Catalonia, Figure S3: Overall life satisfaction of people (aged 16 and over) according to Territorial settings, Catalonia, Figure S4: Percentage of population risk of poverty (60% median) according to Territorial settings, Catalonia, Figure S5: Percentage of population (aged 16 and over) social structure no qualified (ESEC > 3) according to Territorial settings, Catalonia.

Author Contributions: Both authors contributed to the design and conception of the article. J.C. processed the data and created the graphics. O.N. wrote the conceptual section. Both authors contributed to the composition of the rest of the text. Both authors have read and agreed to the published version of the manuscript.

Funding: The original research on which this article is based has been possible thanks to the support of the Institut d'Estudis Catalans and its Section of Philosophy and Social Sciences. The preparation and publication of this article has received financial support from the Ministerio de Ciencia e Innovación «Proyectos de i+d+i» Retos de la sociedad, convocatoria 2019. Referencia PID2019-108120RB-C32.

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: Not applicable.

Data Availability Statement: All information about the source of the data, as well as requesting the microdata can be found https://iermb.uab.cat/es/encuestas/cohesion-social-urbana/#2f756a49-ae6c-6, accessed on 26 May 2021.

Acknowledgments: The data from the Survey of Living Conditions and Habits of the Population (ECVHP) have been specifically used for this research, for which the authors would like to express their gratitude to the IERMB, its director and its research team.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Piketty, T. *Le Capital au XXIe Siècle*; Éditions du Seuil: Paris, France, 2013; ISBN 9782021082289.
2. Stiglitz, J.E. *The Price of Inequality: How Today's Divided Society Endangers Our Future*; W. W. Norton & Company: London, UK, 2012.
3. Sommeiller, E.; Price, M. *The Increasingly Unequal States of America: Income Inequality by State, 1917 to 2011*; Economic Policy Institute: Washington, DC, USA, 2015.
4. Milanovic, B. *Global Inequality: A New Approach for the Age of Globalization*; Harvard University Press: Cambridge, MA, USA, 2016; ISBN 9780674984035.
5. Atkinson, T. What can be done about inequality? *Juncture* **2015**, *22*, 32–41. [CrossRef]
6. OECD Estudios económicos de la OCDE. España. 2018. Available online: https://www.oecd.org/economy/surveys/Spain-2018-OECD-economic-survey-vision-general.pdf (accessed on 13 December 2020).
7. Judt, T. *Ill Fares the Land: A Treatise on our Present Discontents*; Penguin Books: New York, NY, USA, 2011; ISBN 0718191412.
8. Urry, J. *Offshoring*; Polity Press: Cambridge, UK, 2014; ISBN 9780745664866.
9. Fontana, J. *El futuro es un país extraño: Una reflexión sobre la crisis social de comienzos del siglo XXI*; Ediciones de Pasado y Presente: Barcelona, Spain, 2013; ISBN 9788493986353.
10. Streeck, W. *How will Capitalism End?: Essays on a Failing System*; Verso: London, UK, 2016; ISBN 9781784784010.
11. Sumner, A.; Hoy, C.; Ortiz-Juarez, E. *Estimates of the Impact of COVID-19 on Global Poverty*; United Nations University World Institute for Development Economics Research: Helsinki, Finland, 2020.
12. Ahmed, F.; Ahmed, N.; Pissarides, C.; Stiglitz, J. Why inequality could spread COVID-19. *Lancet Public Health* **2020**, *5*. [CrossRef]
13. Guilluy, C. *La France périphérique: Comment on a sacrifié les Classes Populaires*; Flammarion: Paris, France, 2014; ISBN 9782081312579.
14. Nel·lo, O.; Gomà, A. Territori. Diversitat espacial en els hàbits i condicions de vida juvenils: El paper clau de la segregació residencial. In *Enquesta de Joventut de Catalunya 2017 Volum 2. Experiències Juvenils i Desigualtats Socials*; Serrecant, P., Ed.; Generalitat de Catalunya. Departament de Treball, Afers Socials i Families: Barcelona, Spain, 2018; pp. 441–534.

15. Rodríguez-Pose, A. The revenge of the places that don't matter (and what to do about it). *Camb. J. Reg. Econ. Soc.* **2017**, *11*, 189–209. [CrossRef]
16. Traverso, E. *The New Faces of Fascism: Populism and the Far Right*; Verso Books: London, UK, 2019; ISBN 1788730461.
17. Colomb, C. The revolt of the "periphery" against the "metropolis"? Making sense of the French Gilets Jaunes Movement (2018–2020). *Int. J. Urban Reg. Res.* 2020; Available online: https://www.ijurr.org/spotlight-on/urban-revolts/the-revolt-of-the-periphery-against-the-metropolis/ (accessed on 7 February 2021).
18. Fregolent, L.; Nel·lo, O. (Eds.) *Social Movements and Public Policies in Southern European Cities*; Springer International Publishing: Cham, Switzerland, 2021; ISBN 978-3-030-52753-2.
19. Nel·lo, O.; Gomà, A. Geographies of discontent: Urban segregation, political attitudes and electoral behaviour in Catalonia. *City Territ. Archit.* **2018**, *5*, 23. [CrossRef]
20. Dijkstra, L.; Poelman, H.; Rodríguez-Pose, A. The geography of EU discontent. *Reg. Stud.* **2019**, *54*, 737–753. [CrossRef]
21. McCann, P. *The UK Regional-National Economic Problem: Geography, Globalisation and Governance*; Routledge: London, UK, 2016; ISBN 9781138647237.
22. Del Molino, S. *La España Vacía. Viaje por un país que nunca fue*; Turner: Madrid, Spain, 2016; ISBN 978-84-16354-14-6.
23. Storper, M.; Walker, R. *The Capitalist Imperative. Territory, Technology and Industrial Growth*; Blackwell: Cambridge, UK, 1989.
24. Camagni, R. *Principi di economia urbana e territoriale*; Carocci: Rome, Italy, 1993.
25. Iammarino, S.; Rodriguez-Pose, A.; Storper, M. Regional inequality in Europe: Evidence, theory and policy implications. *J. Econ. Geogr.* **2019**, *19*, 273–298. [CrossRef]
26. Cassiers, T.; Kesteloot, C. Socio-spatial Inequalities and Social Cohesion in European Cities. *Urban Stud.* **2012**, *49*, 1909–1924. [CrossRef]
27. Cheshire, P.C. *Segregated Neighbourhoods and Mixed Communities: A Critical Analysis*; Joseph Rowntree Foundation: York, UK, 2007.
28. Maloutas, T. Introduction: Residential Segregation in Context. In *Residential Segregation in Comparative Perspective. Making Sense of Contextual Diversity*; Maloutas, T., Fujita, K., Eds.; Ashgate: London, UK, 2012; pp. 1–36.
29. Oberti, M.; Preteceille, E. *La ségrégation urbaine*; La Découverte: Paris, France, 2016; ISBN 2707164259.
30. Secchi, B. *La città dei ricchi e la città dei poveri*; Laterza: Roma-Bari, Italy, 2013.
31. Tammaru, T.; Marcińczak, S.; van Ham, M.; Musterd, S. (Eds.) *Socio-Economic Segregation in European Capital Cities: East Meets West*; Routledge: New York, NY, USA, 2016; ISBN 9781138794931.
32. Atkinson, R.; Kintrea, K. Disentangling Area Effects: Evidence from Deprived and Non-deprived Neighbourhoods. *Urban Stud.* **2001**, *38*, 2277–2298. [CrossRef]
33. Blank, R.M. Tracing the economic impact of cumulative discrimination. *Am. Econ. Rev.* **2005**, *95*, 99–103. [CrossRef]
34. Nel·lo, O. (Ed.) *Efecto Barrio. Segregación social y condiciones de vida en las grandes ciudades ibéricas*; Tirant Humanidades: València, Spain, 2021; ISBN 978-84-18614-46-0.
35. Slater, T. Your Life Chances Affect Where You Live: A Critique of the "Cottage Industry" of Neighbourhood Effects Research. *Int. J. Urban Reg. Res.* **2013**, *37*, 367–387. [CrossRef]
36. Lefebvre, H. *La production de l'espace*; Seuil: Paris, France, 1974.
37. Harvey, D. *The Limits to Capital*; University of Chicago Press: Chicago, IL, USA, 1982.
38. Harvey, D. *Social Justice and the City*; Johns Hopkins University Press: Baltimore, MD, USA, 1973; ISBN 080181524X.
39. Massey, D. In What Sense a Regional Problem? *Reg. Stud.* **1979**, *13*, 233–243. [CrossRef]
40. Smith, N. *Uneven Development*; Oxford: New York, NY, USA, 1984.
41. Soja, E.W. *Seeking Spatial Justice*; Globalization and Community Series; University of Minnesota Press: Minneapolis, MN, USA, 2010; ISBN 978-0-8166-6668-3.
42. Brenner, N. A Thousand Leaves: Notes on the geographies of uneven development. In *Leviathan Undone? Towards a Political Economy of Scale*; Keil, R., Mahon, R., Eds.; University of British Columbia: Vancouver, BC, Canada, 2009; pp. 27–49.
43. Hartshorne, R. The nature of Geography. A critical survey of current thought in the light of the past. *Ann. Assoc. Am. Geogr.* **1939**, *29*, 171–645.
44. Williams, R. *The Country and the City*; Chatto & Windus (The Random House Group Limited): London, UK, 1973.
45. Christaller, W. *Central Places in Southern Germany*; Prentice Hall, Englewood Cliffs: New Jersey, NJ, USA, 1966.
46. Brenner, N. *Implosions/Explosions: Towards a Study of Planetary Urbanization*; Jovis: Berlin, Germany, 2014; ISBN 9783868593174.
47. Brenner, N.; Schmid, C. The 'Urban Age' in Question. *Int. J. Urban Reg. Res.* **2014**, *38*, 731–755. [CrossRef]
48. Indovina, F. *Dalla città diffusa all'archipelago metropolitano*; Franco Angeli: Milano, Italy, 2009.
49. Soja, E.W. Regional Urbanization and the end of the Metropolis Era. In *Cities in the 21st Century*; Nel·lo, O., Mele, R., Eds.; Routledge: New York, NY, USA, 2016; pp. 41–56. ISBN 978-1-138-11964-2.
50. Massey, D.S.; Denton, N.A. The Dimensions of Residential Segregation. *Soc. Forces* **1988**, *67*, 281–315. [CrossRef]
51. Fujita, K. *Residential Segregation in Comparative Perspective: Making Sense of Contextual Diversity*; Maloutas, T., Fujita, K., Eds.; Ashgate: Surrey, UK, 2012; ISBN 1409418731.
52. van Ham, M.; Tammaru, T.; Ubarevičienė, R.; Janssen, H. (Eds.) *Urban Socio-Economic Segregation and Income Inequality. A Global Perspective*; The Urban Book Series; Springer International Publishing: Cham, Switzerland, 2021; ISBN 978-3-030-64568-7.
53. Maurin, É. *Le ghetto français: Enquête sur le séparatisme social*; Seuil: Paris, France, 2004; ISBN 2020685809.

54. Arbaci, S. *Paradoxes of Segregation: Housing Systems, Welfare Regimes and Ethnic Residential Change in Southern European Cities*; John Wiley & Sons Ltd: Chichester, UK, 2019; ISBN 978-1-444-33832-4.
55. Blanco, I.; Nel·lo, O. (Eds.) *Barrios y Crisis. Crisis económica, segregación urbana e innovación social en Cataluña*; Tirant lo Blanch: València, Spain, 2018; ISBN 9788417203313.
56. Nel·lo, O.; López, J. El procés d'urbanització. In *Raó de Catalunya.La Societat catalana al segle XXI.*; Institut d'Estudis Catalans/Enciclopèdia Catalana: Barcelona, Spain, 2016; pp. 119–148.
57. Subirats, M. *Barcelona: De la necessitat a la llibertat. Les classes socials al tombant del segle XXI*; L'Avenç: Barcelona, Spain, 2012.
58. Giner, S.; Homs, O. (Eds.) *Raó de Catalunya. La societat catalana al segle XXI.*; Institut d'Estudis Catalans/ Enciclopèdia Catalana: Barcelona, Spain, 2016; ISBN 978-84-9965-315-0.
59. Nel·lo, O. *La Ciudad en movimiento: Crisis social y respuesta ciudadana*; Díaz & Pons: Madrid, Spain, 2015; ISBN 978-84-944522-0-8.
60. Cardús, S. (Ed.) *Informe sobre la cohesió social a la Catalunya del segle XXI*; Institut d'Estudis Catalans: Barcelona, Spain, 2020; ISBN 9788499658390.
61. Antón-Alonso, F.; Porcel, S. Del barri a la metròpoli: Dinàmiques de mobilitat residencial metropolitanes. In *Anuari Metropolità de Barcelona 2018: Del barri a la metròpoli*; Clapés, J., Ed.; Institut d'Estudis Regionals i Metropolitans de Barcelona: Bellaterra, Spain, 2019; pp. 11–24, ISBN 978-84-92940-35-6.
62. Els àmbits funcionals Territorials. Departament de Territori i Sostenibilitat. Available online: https://territori.gencat.cat/ca/06_territori_i_urbanisme/ordenacio_del_territori/plans_territorals/plans_territorials_parcials/ambits_funcionals/ (accessed on 30 January 2021).
63. Porcel, S. Desigualtats territorials i mobilitat quotidiana. Una Aproximació socioterritorial a la realitat juvenil catalana. In *Enquesta a la joventut de catalunya 2012, Volum 2*; Serracant, P., Ed.; Generalitat de Catalunya Departament de Benestar Social i Família Direcció General de Joventut: Barcelona, Spain, 2013; pp. 315–379.
64. Nel·lo, O. La segregación urbana en Cataluña. In *Barrios y Crisis. Crisis Económica, Segregación Urbana e Innovación Social en Cataluña*; Blanco, I., Nel.lo, O., Eds.; Tirant Humanidades: Valencia, Spain, 2018; pp. 71–110.
65. OECD. *Country Roads: Education and Rural Life*. Trends Shaping Education Spotlights. 2017. Available online: https://www.oecd-ilibrary.org/education/country-roads_ea43a39d-en (accessed on 28 May 2021).
66. Bonal, X. *La política educativa ante el reto de la segregación escolar en Cataluña*; Prospectivas; UNESCO IIEP: París, France, 2018.
67. Acevedo-Garcia, D.; Noelke, C.; McArdle, N.; Sofer, N.; Hardy, E.F.; Weiner, M.; Baek, M.; Huntington, N.; Huber, R.; Reece, J. Racial And Ethnic Inequities In Children's Neighborhoods: Evidence From The New Child Opportunity Index 2.0. *Health Aff.* **2020**, *39*, 1693–1701. [CrossRef] [PubMed]
68. Brain, I.; Prieto, J. *Understanding Changes in the Geography of Opportunity: The Case of Santiago, Chile*; Lincoln Institute of Land Policy: Cambridge, MA, USA, 2018.
69. Bayona-i-Carrasco, J.; Domingo, A. School segregation of migrants and their descendants in a dual school system: The case of Barcelona. *Popul. Space Place* **2021**, e2446. [CrossRef]
70. Gomà, A.; Muñoz, J. Segregated in the City, Separated in the School. The Reproduction of Social Inequality through the School System. *Urban Sci.* **2018**, *2*, 112. [CrossRef]
71. Flores Martos, R.; Gómez Morán, M.; Renes Ayala, V. *La transmisión Intergeneracional de la pobreza: Factores, Procesos y Propuestas para la intervención*; Fundación FOESSA; Cáritas Españolas: Madrid, Spain, 2016; ISBN 978-84-8440-612-9.
72. Nel·lo, O.; Donat, C. Los efectos territoriales de la crisis económica en la región metropolitana de Barcelona. In *Geografía de la crisis económica en España*; Albertos, J.M., Sánchez, J.L., Eds.; Publicacions Universitat de València: Valencia, Spain, 2014; pp. 565–608.
73. Sarasa, S.; Porcel, S.; Navarro-Varas, L. L'impacte social de la crisi a l'àrea metropolitana de Barcelona i a Catalunya: Annex metodològic II: Classificació Socioeconòmica Europea (ESEC). *Pap. Regió Metrop. Barc. Territ. Estratègies Planejament* **2013**, *56*, 97–99.
74. Borrell, C.; Benach, J. Els Determinants Socials de la Salut. Available online: https://espaifabrica.cat/els-determinants-socials-de-la-salut/ (accessed on 15 July 2020).
75. O'Campo, P.; Wheaton, B.; Nisenbaum, R.; Glazier, R.H.; Dunn, J.R.; Chambers, C. The Neighbourhood Effects on Health and Well-being (NEHW) study. *Health Place* **2015**, *31*, 65–74. [CrossRef]
76. Pemberton, S.; Humphris, R. *Locality, Neighbourhood and Health: A Literature Review*; Iris Working Paper Series: Birmingham, UK, 2016.
77. Phelan, J.C.; Link, B.G.; Tehranifar, P. Social Conditions as Fundamental Causes of Health Inequalities: Theory, Evidence, and Policy Implications. *J. Health Soc. Behav.* **2010**, *51*, S28–S40. [CrossRef]
78. Baena-Díez, J.M.; Barroso, M.; Cordeiro-Coelho, S.I.; Díaz, J.L.; Grau, M. Impact of COVID-19 outbreak by income: Hitting hardest the most deprived. *J. Public Health (Bangkok)* **2020**, 1–6. [CrossRef] [PubMed]
79. Borrell, C.; Benach, J. *(Coord) Evolució de les desigualtats en la salut a Catalunya*; Editorial Mediterrània, Fundació Jaume Bofill: Barcelona, Spain, 2005.
80. Borrell, C.; Rodríguez-Sanz, M.; Ricart, I.; Pérez, G. Les desigualtats socials en salut a Barcelona. *Població vulnerable Barcelona.* **2005**, *13*, 104–113.
81. Checa, J.; Robles, M. ¿Mueren antes los pobres? Esperanza de vida, salud mental y obesidad en la Ciudad. In *Efecto barrio. Segregación Social i Condiciones de Vida en las Grandes Ciudades Ibéricas*; Nel·lo, O., Ed.; Tirant Humanidades: València, Spain, 2021; ISBN 978-84-18614-46-0.

urban science

MDPI

Article

Environmental Justice and Urban Parks. A Case Study Applied to Tarragona (Spain)

Joan Alberich *, Yolanda Pérez-Albert, José Ignacio Muro Morales and Edgar Bustamante Picón

Grup de Recerca d'Anàlisi Territorial i Estudis Turístics (GRATET), Department de Geografia, Universitat Rovira i Virgili, Vila-Seca, 43480 Tarragona, Spain; myolanda.perez@urv.cat (Y.P.-A.); joseignacio.muro@urv.cat (J.I.M.M.); edgar.bustamante@urv.cat (E.B.P.)
* Correspondence: joan.alberich@urv.cat

Abstract: There is consensus regarding the fact that urban green areas contribute to the quality of life of their inhabitants. Therefore, efficient city management must assess whether the population has access to green areas and the areas' quality in relation to, for example, vegetation, facilities or furnishings. Therefore, the objective is to establish environmental justice of urban parks in Tarragona (Spain) by developing a Park Quality Index (PQI) and the sociodemographic characteristics (level of studies, Human Development Index –HDI–, home sale and rental prices) of the population living within 300 m of a park. To prepare this, a GIS-integrated Multi-Criteria Evaluation (MCE) was produced. The results show that the green areas have low accessibility and availability and that most parks obtain an average-low PQI, with the best-valued aspect being the vegetation and the worst being the facilities. Regarding the degree of environmental justice, a causal relationship between the PQI and the indicators used emerges. The average value of the home sale prices is the one that shows the greatest correlation. These results can be used together with participatory procedures as a basis for identifying places with greater inequality, and for selecting the more effective actions that enable increasing environmental justice with respect to green areas.

Keywords: environmental justice; urban parks; ecosystem services; Tarragona

Citation: Alberich, J.; Pérez-Albert, Y.; Morales, J.I.M.; Picón, E.B. Environmental Justice and Urban Parks. A Case Study Applied to Tarragona (Spain). *Urban Sci.* **2021**, *5*, 62. https://doi.org/10.3390/urbansci5030062

Academic Editors: Jesús Manuel González Pérez, María José Piñeira-Mantiñán and Juan Manuel Parreño Castellano

Received: 22 June 2021
Accepted: 13 August 2021
Published: 19 August 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

The concept of environmental justice appeared in the last third of the 20th century, within the framework of "assessing the distribution of the benefits and damage caused by human agents between places and population groups, in order to determine whether or not serious discrimination exists" [1]. The general context was a growing awareness that the spatial distribution of some human activities was clearly discriminatory for one part of the population. For example, the generation, handling and storage of hazardous waste or the territorial distribution of certain pollutant industries tended to be located in areas occupied by the less favored part of the population. Environmental justice considers that "there is a universal right to nature" on all levels (individual, family, community, etc.), with the environment being understood as a common good [2]. Therefore, the basis of the concept is the non-discriminatory distribution of environmental benefits and damages and the need to establish participative decision mechanisms "that can distribute those benefits and damages equitably among a justice community made up of located entities (subjects and objects), both current and future, who may have unequal rights and obligations" [1].

From this perspective, environment justice or discrimination can be measured, in general terms, by calculating the overall computation (social, territorial and temporal) of the environment costs and benefits (which, in economic terms, are often called "externalities") generated by a certain activity or project, so as to later clarify whether the distribution of these elements among the various groups that may be affected by said activity in some way is fair. However, other authors uphold the inclusion of other, non-economic elements in

the analysis, and choose to use indicators and variables of a different level of measurement, by applying multi-criteria analysis [3].

Different authors claim that, traditionally, the study of environmental justice has focused on analyzing the distribution of facilities with toxic emissions, waste dumps and other environment hazards that are disproportionately close to socially disadvantaged groups [4,5]. However, recent works have extended the scope of this concept to include terms such as equitable access to green areas and other natural resources [6,7]. This new interest is related to the conviction that urban parks or urban green areas help to increase the quality of life of city inhabitants because contact with urban nature as public parks promotes well-being and human health in cities [8] and urban residents can receive daily benefits [9].

An important issue shared by the literature we consulted is the actual definition of an urban park. Even though there is no single definition, the one provided by Jennings et al. [7] is considered appropriate (as it is necessarily broad), and states that urban parks are "a kind of green area that is generally public property and, consequently, accessible to the general public; and can include children's parks, leisure facilities and other characteristics that promote open air recreation". In order to analyze these urban green areas, they have been divided into categories according to their surface area and function in the urban space, according to their contents, different services, uses and the social values that they provide for different segments of the population [10,11].

There is consensus over the fact that, broadly speaking, ecosystem services imply benefits [12] in six different areas [13]: (1) they help to fight pollution [14] and contribute to microclimate normalization [15,16]; (2) reduce noise [17]; (3) improve the population's emotional wellbeing and psychophysiological balance by increasing the feeling of security [18]; (4) improve mental and physical health [19]; (5) promote outdoor life and social meetups [20] and (6) increase citizens' environmental awareness [9,21]. Therefore, ecosystem services regulate temperature and humidity, produce oxygen and filter radiation, absorb pollutants and muffle noise and, in addition, they provide an area for walking, relaxation and leisure. However, beyond their intrinsic value (their good organization, quality level or degree of protection), it is often their symbolic dimension which makes them places citizens appreciate.

Therefore, the World Health Organization considers urban green areas to be essential due to their inherent benefits for physical and emotional wellbeing [22]. A large portion of the works published on environmental justice regarding urban parks adopt a quantitative perspective. Qualitative approaches to this question are harder to find. In this respect, a notable exception is the work by Smiley, Sharma, Steinberg, Hodges-Copple, Jacobson and Matveeva (2016) [23], who analyze the opinions and preferences of minority ethnic groups regarding the use of the urban parks in Houston (Texas) using data obtained from two ad hoc surveys. From a quantitative orientation, GIS has been used to process the information. However, some authors have criticized the use of these tools, arguing that they specify the geographical units and threshold distances inappropriately and ignore the actual movement by people. Therefore, in some recent research, people have opted to use the georeferenced data produced by mobile telephones to obtain behavior patterns within green areas. These emphasize the real activities by park users, in terms of both space and time [24]. Another option is the application of a public participation GIS, such as the one used by Laatikainen, Tenkanen, Kyttä and Toivonen (2015) [25], which can provide an alternative to obtaining multifaceted knowledge on accessibility patterns. To establish the relationship between the distribution and quality of the parks and the population's socio-demographic characteristics, the Pearson correlation coefficient [26], the index of dissimilarity or an analysis of conglomerates is used [27]. Often, these parameters are accompanied by the use of statistical indicators to measure the significance of the observed differences, such as the Gini coefficient or the analysis of variance (ANOVA) test [10,28]. Equally, in comparative works between two or more cities, logistic regression techniques have been used to control and neutralize the different characteristics of the urban fabric

among the study cases [29]. Finally, another methodological aspect refers to the actual measurement of the social and environmental quality of the urban parks. In relation to this, some authors express the need to measure six parameters: access, services, security, social inclusion, visual and aesthetic quality and, finally, the ecological function [30].

From this perspective, in order to focus on efficient city management of community interests, we have to assess whether the population has access to green areas and, in addition, the quality of these areas in terms of, inter alia, the existence of vegetation and available or existing facilities or street furnishings. Therefore, the general objective of this work is to establish the degree of environmental justice in the urban parks in the city of Tarragona by establishing a Park Quality Index (PQI) and learning about the population's socio-demographic characteristics. To do this (1) a Multi-Criteria Evaluation (MCE) model was constructed within a GIS, which allows us to establish the PQI, (2) indirect, standardized indicators were determined for the socio-economic characteristics of the population living within 300 m or less of a park, such as the Synthetic Training Index (STI), the Human Development Index (HDI) or home sales prices in each sector, and (3) the PQI was correlated with the population's socio-economic characteristics to obtain the spatial justice results in terms of the availability and quality of urban green areas. The work is organized into six sections, plus the bibliography. The introduction reflects on the concept of environmental justice and reviews the methodological and conceptual aspects; the second section introduces the area of study; the third details the methodology stages and the tools used; the fourth reveals the results; the fifth contains the discussion and the final section includes the conclusions.

2. Area of Study: The Green Areas and the Urban Parks in Tarragona

The city of Tarragona is part of an urban area with nearly 380,000 inhabitants, with 16 municipalities and a surface area of just over 350 square kilometers. In 2019, the municipality of Tarragona had a population of 142,859 inhabitants, who, when distributed over the 57.88 square kilometers of their municipal area, represent a density of 2.468 inhab./km^2. However, this average value does not reflect the internal inequalities, since the city has a clear "oil stain" layout, with a consolidated and densely populated urban center and a polarized periphery [31].

The Catalan Urban Planning Act (revised text of 2010) establishes that the urban structure of the municipalities is made up of general and local systems, the facilities and a system of free public places. The system of free spaces includes parks, gardens, green areas and spaces for amusement, leisure and sport. The urban green system is usually formed in the urban fabric in a series of isolated elements that can have an important ecological value with respect to the continuity of habits. Therefore, the linear elements, such as walks, park ways or linear parks, behave similar to connectors, complemented by the tree-lined roads in the urban section. The interconnection between parks, gardens and interstitial spaces makes up a comprehensive green mosaic that increases biodiversity and implies an improvement in the quality of the public space.

The Tarragona Municipal Urban Planning Plan (2013) defines the municipality's system of free spaces in a broad sense. According to this document, this system includes the public parks and gardens, the ramblas (boulevards), squares and all the free, public green spaces located on urban, urbanizable or non-urbanizable land. Agenda 21 Local in Tarragona considers urban green to be the city spaces where natural elements penetrate in the form of parks or gardens, which are tree-lined, with water bodies or garden elements in the streets.

Between the years 2012 and 2017, the Environment Department of the Tarragona Town Hall quantified a total of 65 green areas intended for public spaces, totaling 371 Ha of urban green (3.71 km^2). These areas include the green spaces that are part of the urban section [32]. Out of this group of green spaces in the city of Tarragona, 14 were defined as urban parks [33]. These are distributed throughout the municipal territory, except in the residential estates in the east (Figure 1). These public facilities respond to very varied typologies, from landscaped urban squares, such as the Sant Antoni park, just over 1200 m^2

or 0.12 hectares, to extensive areas of natural vegetation, such as the fluvial part of the Francolí river, of 13.7 hectares.

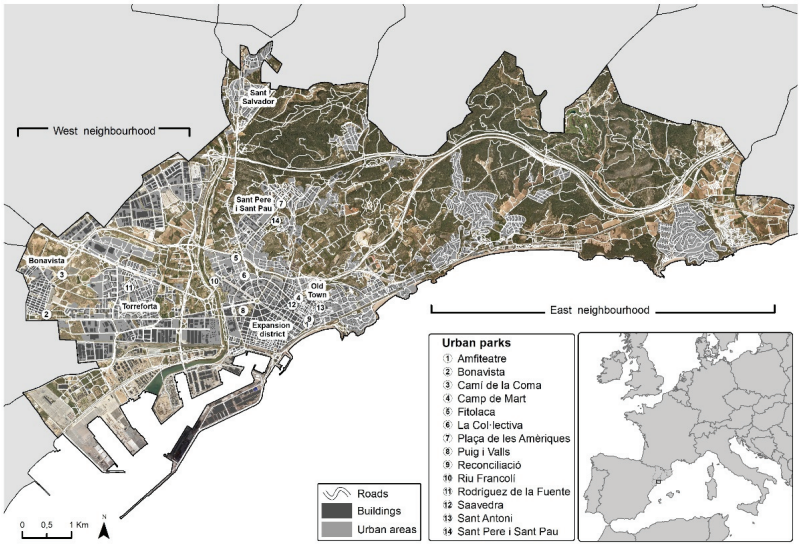


Figure 1. Location of the urban parks in Tarragona. Source: Own work. Orthophotomap base map 1:5000 of Cartographic and Geological Institute of Catalonia.

3. Methodology

The methodology applied in this work uses fieldwork, GIS and statistical analysis as shows Figure 2.

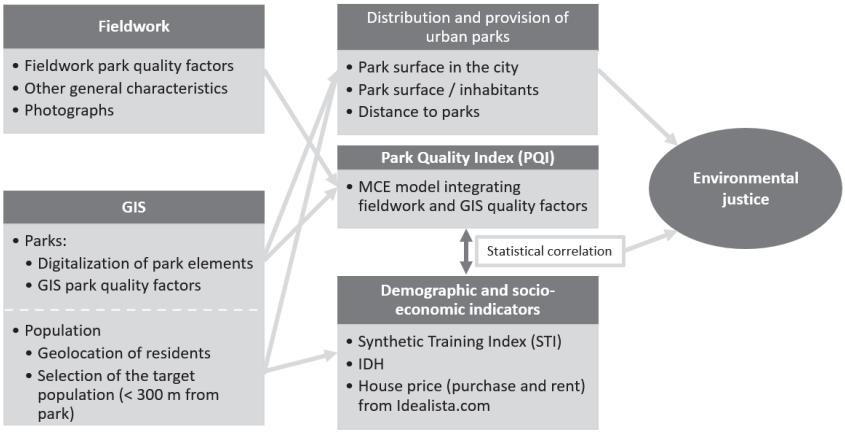


Figure 2. Methodological process.

Fieldwork permitted to obtain general information about parks, measure the quality factors of parks and take photographs. Use of a Geographical Information System (GIS) has made it possible to digitalize the elements that exist in the parks and their limits, geolocate the data regarding the population registered in the Municipal Register of Inhabitants, and select the target population; in other words, that lives within 300 m or less of an access

point of any of the parks and, finally, obtain part of the information needed to develop the MCE model's factors using spatial analysis operations and implementing them.

Finally, statistical analysis was carried out of the sample taken from the selection of inhabitants registered at a distance equivalent to or within 300 m of a park access point to characterize the socio-demographic perspective of the potential users of the said space.

With the set of indicators, both direct and indirect, that characterize the quality of the urban parks, a hierarchical and weighted Multi-Criteria Evaluation Model was designed, which has allowed us to obtain the PQI.

3.1. Obtaining General Information and Factors to Assess the Park Quality

The quality of urban parks is very important with respect to spatial and environmental justice [34]. The quality-of-life community factors for parks used in this work were selected from the Madrid case (Spain) [35] and Bucaramanga (Colombia) [36]. The model included a total of 20 factors. Some of them were obtained through cartographic analysis using GIS (ArcGIS 10.6.1), others were obtained from fieldwork and, most of them applying both methodologies (checking cartographic results with fieldwork) (Table 1).

Table 1. Factor name, description and methodology used to obtain them. Selection based on Canosa, Sáez, Sanabria and Zavala (2003) and Rivera (2015).

Factors	Description	Method	
		GIS	Fieldwork
Presence of vegetation	Percentage of area with vegetation in relation of the total area of the park without accounting for the shade they provide	X	
Green shade	Percentage of area with shade at noon in relation to the total area of the park	X	
Hazards or allergic vegetation	Number of plant species (dangerous or allergenic)		X
Roads	Existence, adequacy and quality of roads and/or trails for the mobility of people	X	X
Architectural barriers	Presence of elements that hinder or prevent access and measures to overcome them		X
Sports equipment	Spaces equipped to play football or basketball	X	X
Gym for seniors	Existence and status of gym for seniors	X	X
Enclosure fencing	Existence of separation of sports areas to avoid dangerous situations for other users		X
Other sports equipment	Sports equipment for minority use such as hockey or volleyball courts	X	X
Facilities for cultural activities in open areas	Amphitheaters or bleachers	X	X
Facilities for cultural activities in closed areas	Indoor spaces suitable for cultural events	X	X
Other facilities	Kiosks or sales stands semi-permanent or seasonal		X
Lighting	Presence of lighting with adequate power and distribution	X	X
Benches	Presence, proper distribution and status of benches	X	X
Other furnishings	Presence and condition of drinking water fountains, ponds or sculptures or monuments	X	X
Children's games	Presence and state of space with swings, slides, seesaws, etc.	X	X
Adult games	Presence and condition of petanque courts or areas set up for board games	X	X
Rubbish bins	Presence and status of rubbish bins	X	X
Dog potty area	Areas with specific sanitary treatments to prevent the transmission of infectious diseases from dogs	X	X
Toilets	Presence of toilets, state of conservation, operation and cleanliness	X	X

Source: own work.

In each urban park in Tarragona, we generated a spatial and theme-based database with information on the urban location, the surface area covered by vegetation, the covered green shadow and the various facilities (Figure 3). This information was digitalized based on the Topographic Map 1:5000 and orthophotography on the same scale; both documents were provided by the Cartographic and Geological Institute of Catalonia (Institut Cartogràfic i Geològic de Catalunya).

Figure 3. Example of the mapping database of the Fitolaca park (Tarragona). Source: own work.

Field work was also carried out, through the visits to the parks included in the study, between the spring and summer of 2018. The purpose of these visits was to obtain the direct information needed to establish the PQI (see Table 1), check the digitalized mapping and take photographs to characterize these spaces.

Each of these 20 factors was assessed on a scale of 0 to 3, where, in a standardized way, the value of 0 corresponds to the lowest quality of the factor, and the value of 3 refers to the highest quality of the factor.

3.2. Creating Demographic and Socio-Economic Population Indicators

Data from the Municipal Register of Inhabitants were used to characterize the population of the city of Tarragona on 31 December 2019. This database stores the residents' postal address and, therefore, it was possible to geolocate the registers based on this address and build up a mapping layer. The geolocation was carried out from the Instamaps platform of the Cartographic and Geological Institute of Catalonia (https://www.instamaps.cat/#/. Accessed from 1 December 2020 to 8 January 2021). The resulting layer was imported to ArcGIS and, using the tool "Near", inhabitants living within 300 m of the nearest park access point were selected and assigned to the nearest park, considering the mode of transport to be walking, because it is healthy and not affected by economic conditioning [37].

Some authors [38] use two factors to characterize the population demographics: the level of study and nationality. The level of study collected in the register of inhabitants in Tarragona refers only to the population aged 16 years old and over, and has been grouped into five categories (illiterate, no schooling completed, primary education, secondary education, university education). To compare the different territorial units, a Synthetic

Training Index (STI) was created based on the introduction of weighting for the population at each training level. The general formula of the STI is as follows:

$$\mathrm{STI} = \frac{(\%\ \text{illiterate} * 1) + (\%\ \text{no schooling completed} * 2) + \left(\%\ \text{primary education} * 3\right) + \left(\%\ \text{secondary education} * 4\right) + \left(\%\ \text{university education} * 5\right)}{5}$$

In this way, an index is obtained with values between 0 and 1, where 0 would be equivalent to the entire illiterate population and 1 would represent the opposite extreme, with the entire population having a university education. In order to neutralize the influence of the population's aged-based structure in terms of education (an older population tends to have lower education levels than a younger population), a direct standardization was carried out, based on the application of a typical population structure (the whole of the population of the city of Tarragona) to the 14 neighborhoods of the parks under analysis.

The second variable chosen is the origin of the population. In this case, we opted to use the population's place of birth, as opposed to nationality, because this addresses the idea of people from immigrant families who were born in Spain. To compare the different territorial units, the population born abroad was characterized using the average HDI value published by the United Nations Population Division in 2020. In addition, in order to better reflect the diversity of the population born in Spain, the HDI of the autonomous community of birth was taken into consideration. This information was obtained from the Valencian Institute of Economic Research (Instituto Valenciano de Investigaciones Económicas, year 2019).

In third place, due to the lack of disaggregated data at the income level, the population's economic characterization was indirectly analyzed based on housing prices. This information was taken from the property portal, Idealista.com, which allows you to consult the average renting and purchasing prices per square meter for apartments in a specific digitalized area. Thanks to this option, it was possible to define the 300 m area of influence around each park. The information obtained in this way is comparable with that from the Register of Inhabitants.

3.3. Creating the Park Quality Index (PQI)

The Multi-Criteria Evaluation (CME) encompasses a set of tools aiming to help decision-making [39], in which the various alternatives determined by multiple criteria and objectives are in conflict [40]. This work adopts the multi-criteria evaluation model in order to discover the degree of quality or suitability of urban parks, based on the selection of a series of indicators, subindicators and factors (Figure 4). To do this, the initial 20 factors (first hierarchical level) were grouped into seven subindicators (second hierarchical level) and, in turn, these were joined together in three indicators that correspond to (1) the quality of the vegetation, (2) the quality of the facilities and (3) the quality of the street furnishings (level 3). Finally, the combination of the three indicators leads to the Quality-of-Life Community indicator for parks (PQI) (level 4).

One of the essential characteristics of an MCE is the importance or weights according to the percentage of each factor, subindicator and indicator used in the model. The final result will largely depend on the weight that is assigned to each part of the model. In this case, the weight assignment is related to the established hierarchies and groups, so that they each add up to 100%. If we take the third hierarchical level as an example, and apply the decision formula or rule, vegetation is combined with a 40% weighting and facilities are combined with a 30% weighting, while the weighting for property is 30%. In order to perform the different aggregations of the model, we used the Weighted Overlay command in ArcGIS 10.6.1.

3.4. Statistical Analysis and Environmental Justice

Finally, once the IQP for each park was calculated, it was correlated with the demographic and socioeconomic characteristics of the population assigned to each park

(populations at a distance < 300 m). To measure the fit of the variables, the Pearson correlation index (R^2) was calculated using MS Excel software.

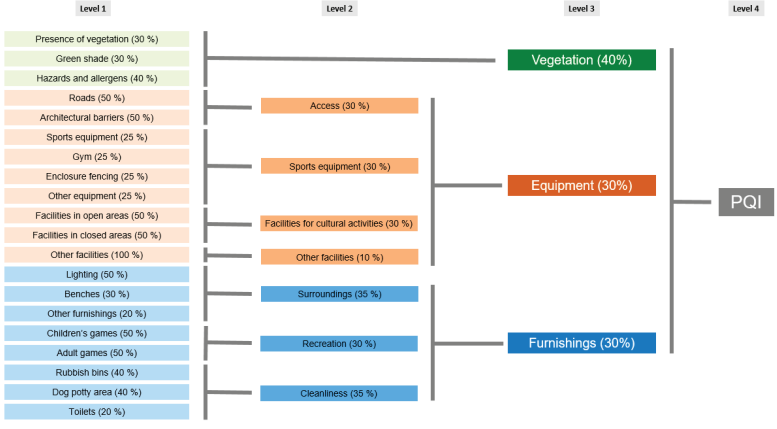


Figure 4. MCE of the quality of urban parks. Source: own work.

4. Results

The results of the research are structured in three areas. First, those related to the distribution and provision of the urban parks in the city; second, their quality based on calculation of the PQI; third, an attempt to determine whether environmental justice exists by relating, on the one hand, the quality of the parks and, on the other hand, the population's socio-demographic characteristics.

4.1. The Distribution and Provision of Urban Parks in the City

The distribution of parks in Tarragona reveals that they are concentrated in the central part of the city. This corresponds to the area with the highest density populations: out of the 14 parks, five are located in the Ensanche area (Saavedra, Camp de Mart, La Col·lectiva, Riu Francolí and Puig i Valls parks). This highlights the number of parks in the eastern area, with the Amfiteatre park, in Sant Antoni and the Reconciliació park. However, three aspects need to be specified: (a) this is the urban area with the largest surface area in the whole city; (b) the total surface area of the existing parks is not very big and most of them cover an average or small surface area; and (c) most are in the area nearest the city center, neighboring the historic center, where there is no urban park because of the morphological characteristics. The northern area has low-density residential estates and does not have these facilities (Figure 5). The existence of a high number of private urban green areas means that there are no public urban spaces. The districts to the west of the city have a high population and proportionally few urban parks.

According to the data taken from the land registry plots in each of the 14 urban parks listed by the town hall in the city of Tarragona, their total surface area is 374,606 sqm. However, this overall figure hides various case studies: the surface area differs considerably between the parks, with two of them, the Riu Francolí park (with 130,684 sqm.) and Sant Pere i Sant Pau park (with 122,130 sqm.), representing two thirds of the total surface area of urban parks (Figure 5). At the other extreme, we find parks that correspond more to the concept of landscaped square, such as the Sant Antoni square (1294 sqm.) and Fitolaca square (1558 sqm.).

There is also a difference between the occupancy percentages of each surface area type in the parks (green areas, bare soil, roads and facilities). Generally speaking, vegetation is the predominant type, as it covers a little more than half the area (55.1%), with much higher values in the cases of the Bonavista (81.5%) and, particularly, the Sant Pere i Sant Pau

(88.2%) parks. In the case of the latter, its large surface area makes it the city's "green lung". At the other extreme, we have the "landscaped squares" in Sant Antoni and Rodríguez de la Fuente, which have extremely low vegetation values (14.5% and 17.0%, respectively).

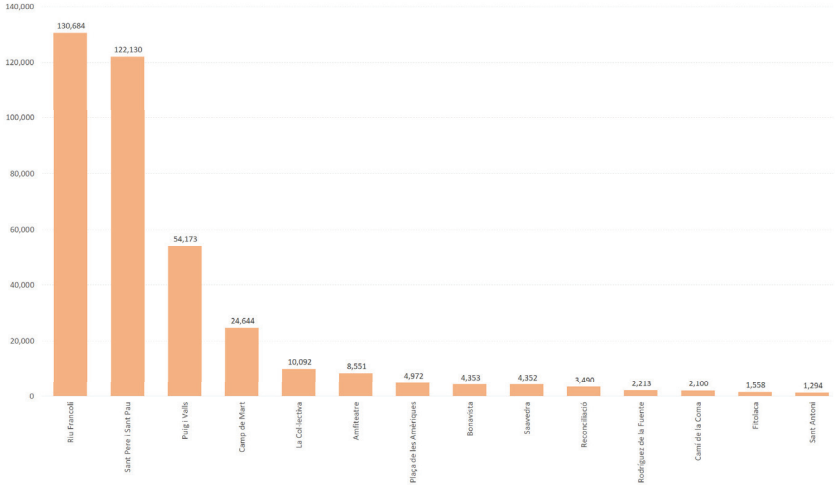


Figure 5. Surface area of the urban parks in Tarragona, in sqm. Source: own work.

Finally, it is worth highlighting the disparity between the surface areas occupied by the various facilities (sport, culture, etc.) in each park. In some parks, these elements are completely non-existent (La Col·lectiva and Rodríguez de la Fuente parks), while in others (Camp de Mart and Camí de la Coma park), at least one third of the surface area is covered by facilities.

4.2. The Provision and Distribution of Urban Parks with Respect to the Population

The surface area of the urban parks in relation to the inhabitants shows an average available surface area of 2.62 sqm. per inhabitant. This figure rises to 15.09 m^2/inhab. with all the green spaces (periurban) in the municipality. The value achieves the thresholds recommended by the World Health Organization, which establishes a figure of around 10–15 sqm./inhabitant. Regarding their accessibility, 39% of the population in the Tarragona capital live within 300 m of an urban park and the average distance in a straight line is 710 m, which is much higher than recommended (Table 2).

If the urban areas are used as the analysis unit, we can observe that the provision of urban park surface area per inhabitant is unequal according to the area of residence. This geographic distribution shows an important degree of environmental injustice. Therefore, some areas appear without any urban parks inside them (the historical center and Sant Salvador), whereby the rate is 0 sqm./inhabitat. In some areas, such as in the case of Bonavista, the parks lie in the periphery of the urban area. In others, such as Torreforta and Ensanche, there is a minimum provision per inhabitant, resulting from the combination of its relatively high population and the low surface area of the existing parks. The area with the residential estates in the eastern area (Levante) has below-average values, but, due to its urban characteristics, it is marked by a low density, the presence of private green areas and its disconnection from the city.

4.3. The Quality of Urban Parks

The average PQI in Tarragona is 53.39 points, with the highest assessment occurring in vegetation (67.86), followed by street furnishings (45.50) and facilities (32.32) (Table 3 and Figure 6). Out of the 14 urban parks analyzed, none of them showed a "good" quality (PQI equal to or higher than 70 points) and only four have a "medium-high" rating

(60–69 points). Specifically, these are the Puig i Valls park (62.81), the Riu Francolí park (62.22), the Amfiteatre park (61.42) and the Fitolaca park (60.29). Their overall score (total assessment of vegetation, facilities and furnishings) is due to different factors. Therefore, the Puig i Valls and Amfiteatre parks owe their high assessment to the vegetation (number of examples, green shadow and absence of allergenic species, 80.00 and 83.33, respectively), although they have lower scores for the other two indicators (facilities 39.00 and 32.08; furnishings 40.02 and 59.15, in the same previous order). On the contrary, the good score obtained by the Riu Francolí park is not due to the assessment of its vegetation (with 53.33 points, it is the third lowest urban green area in the city). Instead, it is due to the good quality of both its facilities (74.78) and its furnishings (67.43), in which it leads the city ranking as a whole.

Table 2. Average surface area available per inhabitant and average distance to the nearest urban park.

Urban Parks	Total Population			Population Living < 300 m		
	Inhabitants	Average Distance (m.)	sqm./Inhabitant	Inhabitants	Average Distance (m.)	sqm./Inhabitant
Amfiteatre	4053	518.1	2.11	918	205.2	9.31
Bonavista	9945	337.1	0.44	4440	181.7	0.98
Camí de la Coma	2931	436.7	0.72	308	270.3	6.82
Camp de Mart	5618	294.3	4.39	2841	202.3	8.67
Fitolaca	1089	334.9	1.43	314	235.4	4.96
Riu Francolí	6799	207.3	1.48	6131	123.2	1.65
La Col·lectiva	6190	257.9	0.80	4374	189.4	1.14
Pl. de les Amèriques	20,867	1285.5	2.60	6296	170.6	8.60
Puig i Valls	32,105	369.3	0.11	13,046	154.1	0.27
La Reconciliació	2015	155.6	64.86	2015	155.6	64.86
Rodríguez de la Fuente	23,728	435.6	0.09	5331	172.7	0.42
Saavedra	9565	324.9	0.45	4245	196.0	1.03
Sant Antoni	15,168	2424.4	0.09	3004	157.2	0.43
Sant Pere i Sant Pau	2786	179.8	43.84	2395	137.2	50.99
Total	142,859	710.3	2.62	55,658	166.4	6.73

Source: own work.

Table 3. PQI values for each park and each indicator.

Urban Parks	Vegetation (40%)	Facilities (30%)	Furnishings (30%)	PQI (100%)
Amfiteatre	83.33	39.00	40.02	61.42
Bonavista	86.67	31.60	33.67	59.65
Camí de la Coma	36.67	54.28	52.00	44.90
Camp de Mart	63.33	35.48	41.34	50.87
Fitolaca	80.00	30.00	51.17	60.29
Riu Francolí	53.33	74.78	67.43	62.22
La Col·lectiva	80.00	15.65	47.00	55.66
Pl. de les Amèriques	46.67	26.00	62.83	45.54
Puig i Valls	80.00	32.08	59.15	62.81
La Reconciliació	63.33	14.40	45.58	46.66
Rodríguez de la Fuente	63.33	33.15	16.33	44.04
Saavedra	63.33	34.63	36.60	49.47
Sant Antoni	66.67	1.25	56.60	47.80
Sant Pere i Sant Pau	83.33	3.20	27.35	56.05
Total	67.86	32.32	45.50	53.39

Source: own work.

Figure 6. Location and quality level of the urban parks in Tarragona. Source: own work.

For the "medium-low" score (between the values 50 and 59 in the PQI), we find four parks: Bonavista, Sant Pere i Sant Pau, la Col·lectiva and el Camp de Mart. The good quality of their vegetation, which helps to offset their fairly mediocre scores in the other two PQI components, gives them an intermediary score. The most representative case in this respect is the Col·lectiva park, where the quality of the vegetation (80 points, the sixth highest) offsets the discrete score for its facilities (15.65).

Finally, we found six parks with a "low" assessment for their quality (PQI under 50 points): Saavedra, Sant Antoni, La Reconciliació, plaça de les Amèriques, Camí de la Coma and Rodríguez de la Fuente. In all of them, with the exception of the Camí de la Coma park, the best scoring indicator was for the vegetation, while, in the other two indicators (facilities and furnishings), low values were obtained (Table 3). The extreme cases are the furnishings score in the Rodríguez de la Fuente park (16.55) and, particularly, the score for the virtually non-existent facilities in the Sant Antoni park (1.25).

The results of the analysis reveal a meagre relationship between the location of the parks in the urban area and their quality. In terms of environmental justice, it could be expected that the parks located in the more peripheral areas were of a lower quality, while those in the center of the urban hub were better quality. However, in all the urban areas, there are parks with different assessments according to their PQI. To provide just one example in this case: two urban parks very close together, the Amfiteatre park and Reconciliació park, separated by just one street, have very different PQI values: while the first one has "medium-high" quality (61.42 points), the second one has "low" quality (46.66).

4.4. Environmental Justice Regarding Socio-Economic Characteristics: The Level of Studies, the Place of Birth and Housing Prices

As we can see from Figure 7a, the relationship between the PQI value and the standardized STI of the population living within 300 m reveals a degree of environmental inequity. On the one hand, with the positive value of the R^2 coefficient and, on the other hand, the actual positive slope of the trend line, it can be concluded that there is a causal relationship between the parks with a lower level of quality and the lower level of studies among the population living within 300 m. In spite of this, this relationship is not particularly robust, with an R^2 coefficient value of 0.1159. One factor that influences this behavior lies in the lower values of some urban parks, which are much lower than the other analyzed cases. In the urban parks with better values, the relationship between their

coefficient is not so clear; in other words, the higher values in a variable correspond to the highest scores in the other one.

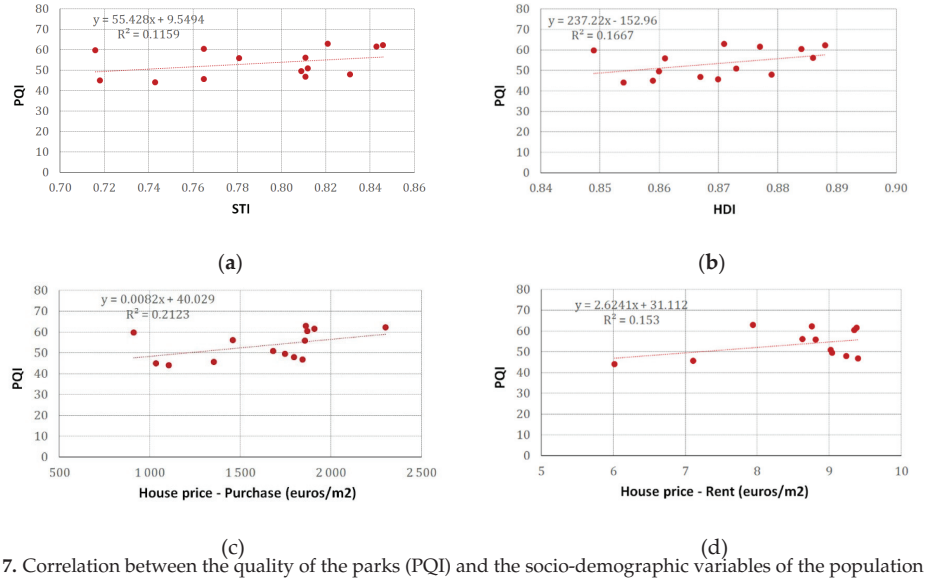


Figure 7. Correlation between the quality of the parks (PQI) and the socio-demographic variables of the population living within 300 m of the nearest park: (**a**) study level index for the population; (**b**) average value of HDI; (**c**) Average value of the purchasing price (euros/m^2) and (**d**) average value of the rental price (euros/m^2). Source: own work.

The results of the correlation between the HDI of the place of birth and the PQI reveal a clear correlation: the PQI value for each park and the average value of the HDI correlate with an R^2 of 0.1667 (Figure 7b).

The correlations between the PQI and the average price per square meter that is purchased or rented (Figure 7c,d, respectively) show fairly similar situations: if the dwelling is purchased or rented, its price is higher among those located near the greater quality parks. There is also a clearer relationship (R^2 = 0.2123) in the case of purchased dwellings, as the result of a direct linear correlation, whereby the lowest values of one variable are also related to the lowest indicators of the other variable and vice versa. It could be presumed that this direct relationship has something to do with the more or less central location of each park with respect to the city as a whole, understanding that the housing prices follow a more or less concentric logic, where the more central apartments have higher prices than those located in peripheral areas.

At any event, although this idea in the case of the dwellings is certain, it has already been mentioned that the quality of the parks does not follow this pattern, and so the robustness of the relationship is not due to this trend. A weaker, but equally positive (Figure 7c,d) relationship is the one between the price of home rentals and each park's PQI (R^2 = 0.1530).

5. Discussion

This article assesses the environmental justice in the city of Tarragona (Spain) with respect to the accessibility, availability and quality of the urban parks and the socio-demographic characteristics of its population. According to the Regional Office for Europe of the World Health Organization [22], the minimum surface area of urban green areas must be between 10 and 15 square meters per inhabitant, and within a distance of 300 m or 5 min walk from the dwelling. However, some authors [41] maintain that this strictly quantitative measurement of the provision of green spaces is not enough, and that the

parks must fulfil three basic conditions: availability (they are within a distance that allows its potential users to enjoy it), accessibility (when the user feels welcome, can access the park freely and use it for recreational purposes at any time) and, finally, a certain degree of attractiveness (when the space responds to individual needs, expectations and preferences).

A significant part of the work on environmental justice and urban parks has focused on assessing the distribution of green areas in the city [42,43] by calculating the distance between the place of residence and the nearest green area and using a geographic information system [44]. Even though the most frequently used unit is the distance in meters, some authors choose to measure accessibility using the travelling time according to the means of transport used (public transport, by foot, by bicycle and private car) [45]. Calculating these indicators using Euclidean and network distances shows a clear influence of the type of distance chosen (Euclidean versus the distance in the network). Therefore, we have to use these indicators carefully as planning support tools.

Analysis of accessibility, understood to be the physical or time separation between the actual location of the park and the users' place of residence, is complemented by architectural accessibility issues (for example, if it is a non-closed space); psychological accessibility (if it is attractive enough for potential users to visit) [41] or its "walkability", i.e., whether parks are accessible to people with limited mobility, such as children or the older population [46].

Some of the limitations found in this study are related to urban mobility. By selecting a population within a certain distance threshold with respect to a park, you start with the premise that the population only uses the urban parks in their own urban residency area, in other words, as if these urban divisions led to "islands" or self-contained compartments, without people moving from one to the other. Obviously, this is not entirely true, since mobility is a fundamental component of cities, conditioned by the place of residence and the locations that people visit regularly (work, leisure areas, daily shopping, children's study area). Therefore, beyond the analysis of the provision of urban parks based strictly on the place of residence, it would be important to note the population's daily mobility. The type of mobility used here is by foot, following the recommendations of the World Health Organization. However, due to the promotion of public transport as part of countries' commitment to reduce the consumption of hydrocarbon fuels, and the proliferation of Personal Mobility Vehicles (PMV), this segmented conception of the city has to change or, at least, reconsider the cut-off thresholds and account for other types of mobility. It is also necessary to mention that when selecting the population that are served by a park, the Euclidean distance, i.e., the distance in a straight line from the nearest park to the place of residence, was used, instead of the real distance using the city's road section. With this latter consideration, accuracy could be increased. On the other hand, the central location of the urban parks with respect to the city as a whole can influence the value of the homes located in more central areas, as opposed to others that are further away. In the case of the quality of the Tarragona parks, we did not find this association, and so the statistical correlation does not follow this trend.

The potential user public in each park (served population) is not made up of a uniform group of individuals with common demographic, economic and social characteristics. In fact, there is a consensus that social injustice regarding urban green areas usually comes along with a certain social stratification and/or residential segregation [47], which can lead to what some authors call "green gentrification" [43]. In this respect, some contributions examine the relationship between the number, proximity and quality of green areas, the socio-economic characteristics of the inhabitants [10,26,44,48] and the composition of the dwellings [48] In addition to these characteristics, consideration is often given to the ethical composition [28,29,49]. For example, De Suosa et al. (2018) [43], in their comparative work between Faro (Portugal) and Tartu (Estonia), observed significant inequalities in the housing districts of the socialist stage in the first of the cities, where most of the Russian minorities live (with a variable availability of public green spaces between 1.04 and 164.07 sqm. per inhabitant), whereas the Romanian communities in Faro were located

in districts without access to public green spaces, although there were smaller differences (from 1.22 to 31.44 sqm. per inhabitant). Other studies, on the other hand, focus on specific demographic groups such as young people [13,50] or immigrants [27]. The availability of this information and its high degree of territorial disaggregation in sources such as the Municipal Register of Inhabitants makes it easy to use, since it can be georeferenced. The data on the population's income are a different case, because, due to confidentiality issues, they are difficult to obtain. In this case, it is essential to use secondary sources to deduce the economic level of the population that a park serves.

The relationship between the disaggregated and precise socio-economic data made it possible to obtain positive correlations between these characteristics, park accessibility and quality, providing evidence of deficits in some areas in the city of Tarragona. Certain urban areas are under-endowed with urban parks vis-à-vis the land occupancy system and are mostly under dispersed forms and without general system reservations, beyond the needs arising from mobility. They require greater research attention. By comparing the different green areas with the neighborhood's social characteristics, it is possible to identify the priority areas and improve their condition, accessibility, quality and distribution [51]. This research has not segmented the socio-economic information on specific groups (according to age, origin), although it has standardized the values used for analyzing them. In future research, it would be relevant to consider the different user groups, the feeling of safety and security and social interaction.

This work has considered the quality of the parks as a factor of environmental justice because urban green areas are relevant for the urban quality of life and for promoting environmental equity [52]. Some authors [53] believe that in order to determine the environmental justice, accessibility and availability of green areas, you have to also consider their quality. The results of their analysis, combined with the socio-economic characteristics, broaden the understanding of environmental justice with respect to the parks. The literature on this issue has found numerous proofs of this. Corley et al. [30] established relationships between the various aspects involved in the quality of urban green areas, and Brown et al. [54] found significant associations between types of urban park and their benefits for the population. Another important conclusion drawn from these approximations is that improving and designing urban parks should consider resident preferences [55,56]. These actions would allow them to become community assets [57].

In response to this need, this work built the PQI: a synthetic index that can be used to assess environmental justice with greater precision than the availability of green surface areas or their distance. Another significant contribution from this work is that the lack of information on the population's income level was substituted by alternative sources. Therefore, to establish correlations with the PQI, the work instead used the level of studies, the resident population's HDI and home sale and rental prices within 300 m of a park. Out of these variables, the one that showed the strongest correlation was home sale prices.

Using the MCE techniques to build the PQI is an attempt to reduce subjectivism, but this always remains because choosing the factors and their weights is a subjective action. Differentiating between the selection of weights (vegetation 40%, facilities 30% and furnishings 30%) can provide a positive reading due to the possible actions aimed at increasing the quality of the parks: improvements to vegetation may require a greater economic effort which, in some cases, has a temporary repercussion (e.g., annual vegetation) or, in others, long-term results were obtained (e.g., time it takes for the tree vegetation to reach adult age). Intervention and maintenance regarding facilities and, particularly, furnishings, can lead to gains in the quality of the parks in a relatively economic way, in a short-term and with significant durability.

6. Conclusions

There is great disparity among the parks in the city of Tarragona: peripheral parks and central parks; large parks and landscaped squares. In terms of quality, vegetation is the parameter with the best score, while facilities and furnishings have deficiencies.

The value obtained for accessibility is lower than that recommended by the EU, and the same was true for the availability of green spaces, although this reduces if we consider green spaces overall. Based on the correlations between the PQI and the population's socio-economic characteristics, it can be stated that there is a causal relationship between these variables. However, the levels of environmental injustice are reduced. In this sense, in future work, the study could be improved by a more in-depth analysis of the type of vegetation, since certain types of vegetation provide different benefits to the population and, in some cases, can even cause harm; addition of other factors such as landscape quality assessment or new sources as the vegetation index of normalized difference (NDVI), which allows for an estimation of the quantity, quality and development of the vegetation; and, finally, incorporating the user's perception in the PQI model.

This work has shown that the relationship between access to green areas and environmental justice is complex. The aggregate results of the PQI as well as those of the sub-indicators and factors can be used by a competent administration to decide which parks should be a priority and which factors should be improved in each of them. The deficits in accessibility and quality can be overcome with strategies and actions, which will, on the one hand, increase the supply of green spaces in places with inequities and, on the other, increase the quality of these parks, with a greater endowment of cultural, recreational and sport facilities. The new urban agendas, especially in the post-pandemic context, include an analysis of urban habitability, reduction in social inequalities and improvements in health conditions; therefore, the planning, design and management of urban green areas should take socio-spatial attributes into account.

Author Contributions: Conceptualization, J.A., J.I.M.M. and Y.P.-A.; methodology, J.A. and Y.P.-A.; software, J.A., J.I.M.M., Y.P.-A. and E.B.P.; validation, J.A. and Y.P.-A.; formal analysis, J.A., J.I.M.M., Y.P.-A. and E.B.P.; investigation, J.A., J.I.M.M., Y.P.-A. and E.B.P.; resources, J.I.M.M.; data curation, J.A., Y.P.-A. and E.B.P.; writing—original draft preparation, J.A., J.I.M.M., Y.P.-A. and E.B.P.; writing—review and editing, J.A., J.I.M.M., Y.P.-A. and E.B.P.; visualization, J.A, and E.B.P.; supervision, Y.P.-A.; project administration, Y.P.-A.; funding acquisition, Y.P.-A. All authors have read and agreed to the published version of the manuscript.

Funding: This work is part of the research project entitled «El paisaje como valor colectivo. Análisis de su significado, usos y percepción social» (The landscape as a common value. Analysis of its significance, uses and social perception) (CHORA-CSO2017-82411-P), financed by the Ministry of Science, Innovation and Universities (National Programme for Fostering Excellence in Scientific and Technical Research 2018–2020), AEI/FEDER, EU and Department of Research and Universities of the Generalitat of Catalonia (2017SGR22).

Institutional Review Board Statement: Ethical review and approval were waived for this study, due to it did not collect critical personal information.

Informed Consent Statement: Not applicable.

Data Availability Statement: Raw data were generated at Tarragona City Council (Ajuntament de Tarragona). Derived data supporting the findings of this study are available within the article and from the corresponding author J.A. on request.

Acknowledgments: We acknowledge Lourdes Llorach de la Peña, Joan Jaume Iniesta Girona (Tarragona City Council/Ajuntament de Tarragona) and Robert Casadevall Camps and Marc Domínguez Mallafré (Universitat Rovira i Virgili) for their co-operation for documenting this work.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Moreno Jiménez, A. Justicia Ambiental. Del Concepto a La Aplicación En Planificación y Análisis de Políticas Territoriales. *Scripta Nova* **2010**, *14*. Available online: http://www.ub.es/geocrit/sn/sn-316.html (accessed on 8 March 2021).
2. Flipo, F. L'espace Écologique: Fondements d'une Théorie Politique de La Dimension Naturelle de La Liberté. *Les Cahiers du pôle de Recherche et d'Enseignement Proses FNSP* **2002**, 12–24. Available online: https://hal.archives-ouvertes.fr/hal-00957848/document (accessed on 8 March 2021).
3. Martínez Alier, J.; Roca Jusmet, J. *Economía Ecológica y Política Ambiental*; Fondo de Cultura Económica: Mexico City, Mexico, 2015.

4. Arriaga, A.; Pardo, M. Justicia Ambiental. El Estado de La Cuestión. *Revista Internacional de Sociología* **2011**, *69*, 627–648. [CrossRef]
5. Chakraborty, J.; Collins, T.W.; Montgomery, M.C.; Grineski, S.E. Social and Spatial Inequities in Exposure to Flood Risk in Miami, Florida. *Nat. Hazards Rev.* **2014**, *15*, 04014006. [CrossRef]
6. Boone, C.G.; Buckley, G.L.; Grove, J.M.; Sister, C. Parks and People: An Environmental Justice Inquiry in Baltimore, Maryland. *Ann. Assoc. Am. Geogr.* **2009**, *99*, 767–787. [CrossRef]
7. Jennings, V.; Johnson Gaither, C.; Gragg, R.S. Promoting Environmental Justice through Urban Green Space Access: A Synopsis. *Environ. Justice* **2012**, *5*, 1–7. [CrossRef]
8. Battisti, L.; Pille, L.; Wachtel, T.; Larcher, F.; Säumel, I. Residential Greenery: State of the Art and Health-Related Ecosystem Services and Disservices in the City of Berlin. *Sustainability* **2019**, *11*, 1815. [CrossRef]
9. Säumel, I.; Hogrefe, J.; Battisti, L.; Wachtel, T.; Larcher, F. The Healthy Green Living Room at One's Doorstep? Use and Perception of Residential Greenery in Berlin, Germany. *Urban For. Urban Green.* **2021**, *58*, 126949. [CrossRef]
10. Almohamad, H.; Knaack, A.L.; Habib, B.M. Assessing Spatial Equity and Accessibility of Public Green Spaces in Aleppo City, Syria. *Forests* **2018**, *9*, 706. [CrossRef]
11. Ibes, D.C. Sustainable Urban Park Systems. *Cities Environ. CATE* **2014**, *7*, 8.
12. Costanza, R.; de Groot, R.; Braat, L.; Kubiszewski, I.; Fioramonti, L.; Sutton, P.; Farber, S.; Grasso, M. Twenty Years of Ecosystem Services: How Far Have We Come and How Far Do We Still Need to Go? *Ecosyst. Serv.* **2017**, *28*, 1–16. [CrossRef]
13. Wolch, J.R.; Byrne, J.; Newell, J.P. Urban Green Space, Public Health, and Environmental Justice: The Challenge of Making Cities "Just Green Enough". *Landsc. Urban Plan.* **2014**, *125*, 234–244. [CrossRef]
14. Su, J.G.; Jerrett, M.; de Nazelle, A.; Wolch, J. Does Exposure to Air Pollution in Urban Parks Have Socioeconomic, Racial or Ethnic Gradients? *Environ. Res.* **2011**, *111*, 319–328. [CrossRef]
15. Jim, C.Y.; Chen, W.Y. Consumption Preferences and Environmental Externalities: A Hedonic Analysis of the Housing Market in Guangzhou. *Geoforum* **2007**, *38*, 414–431. [CrossRef]
16. Gill, S.E.; Handley, J.F.; Ennos, A.R.; Pauleit, S. Adapting Cities for Climate Change: The Role of the Green Infrastructure. *Built Environ.* **2007**, *33*, 115–133. [CrossRef]
17. Margaritis, E.; Kang, J. Relationship between Green Space-Related Morphology and Noise Pollution. *Ecol. Indic.* **2017**, *72*, 921–933. [CrossRef]
18. Branas, C.C.; Cheney, R.A.; MacDonald, J.M.; Tam, V.W.; Jackson, T.D.; ten Have, T.R. A Difference-in-Differences Analysis of Health, Safety, and Greening Vacant Urban Space. *Am. J. Epidemiol.* **2011**, *174*, 1296–1306. [CrossRef]
19. Coppel, G.; Wüstemann, H. The Impact of Urban Green Space on Health in Berlin, Germany: Empirical Findings and Implications for Urban Planning. *Landsc. Urban Plan.* **2017**, *167*, 410–418. [CrossRef]
20. Bijker, R.A.; Sijtsma, F.J. A Portfolio of Natural Places: Using a Participatory GIS Tool to Compare the Appreciation and Use of Green Spaces inside and Outside Urban Areas by Urban Residents. *Landsc. Urban Plan.* **2017**, *158*, 155–165. [CrossRef]
21. Larcher, F.; Pomatto, E.; Battisti, L.; Gullino, P.; Devecchi, M. Perceptions of Urban Green Areas during the Social Distancing Period for COVID-19 Containment in Italy. *Horticulturae* **2021**, *7*, 55. [CrossRef]
22. WHO Regional Office for Europe. *Urban Green Spaces and Health. A Review of Evidence*; WHO: Copennhagen, Denmark, 2016.
23. Smiley, K.T.; Sharma, T.; Steinberg, A.; Hodges-Copple, S.; Jacobson, E.; Matveeva, L. More Inclusive Parks Planning: Park Quality and Preferences for Park Access and Amenities. *Environ. Justice* **2016**, *9*, 1–7. [CrossRef]
24. Xiao, Y.; Wang, D.; Fang, J. Exploring the Disparities in Park Access through Mobile Phone Data: Evidence from Shanghai, China. *Landsc. Urban Plan.* **2019**, *181*, 80–91. [CrossRef]
25. Laatikainen, T.; Tenkanen, H.; Kyttä, M.; Toivonen, T. Comparing Conventional and PPGIS Approaches in Measuring Equality of Access to Urban Aquatic Environments. *Landsc. Urban Plan.* **2015**, *144*, 22–33. [CrossRef]
26. Tu, X.; Huang, G.; Wu, J. Contrary to Common Observations in the West, Urban Park Access Is Only Weakly Related to Neighborhood Socioeconomic Conditions in Beijing, China. *Sustainability* **2018**, *10*, 1115. [CrossRef]
27. Kabisch, N.; Haase, D. Green Spaces of European Cities Revisited for 1990–2006. *Landsc. Urban Plan.* **2013**, *110*, 113–122. [CrossRef]
28. Lara-Valencia, F.; García-Pérez, H. Disparities in the Provision of Public Parks in Neighbourhoods with Varied Latino Composition in the Phoenix Metropolitan Area. *Local Environ.* **2018**, *23*, 1107–1120. [CrossRef]
29. Rigolon, A.; Browning, M.; Jennings, V. Inequities in the Quality of Urban Park Systems: An Environmental Justice Investigation of Cities in the United States. *Landsc. Urban Plan.* **2018**, *178*, 156–169. [CrossRef]
30. Corley, E.A.; Ahn, J.J.; Kim, Y.; Lucio, J.; Rugland, E.; Molina, A.L. Conceptualizing Lenses, Dimensions, Constructs, and Indicators for Urban Park Quality. *Environ. Justice* **2018**, *11*, 208–221. [CrossRef]
31. Saladié, Ò.; Roquer, S.; Muro, J.; Oliveras, J. La Ciutat Actual. Geografia i Urbanisme. In *Història de Tarragona*; Pagès Editors: Lleida, Spain, 2012; Volume 6.
32. Ajuntament de Tarragona. *Tarragona En Xifres 2017*; Ajuntament de Tarragona: Tarragona, Spain, 2017.
33. Ajuntament de Tarragona. Espais Verds i Parcs Urbans de Tarragona. 2020. Available online: https://www.tarragona.cat/neteja-i-medi-ambient/espais-verds-i-camins/parcs-urbans (accessed on 8 March 2021).
34. Pacione, M. Urban Environmental Quality and Human Wellbeing—A Social Geographical Perspective. *Landsc. Urban Plan.* **2003**, *65*, 19–30. [CrossRef]

35. Canosa Zamora, E.; Sáez Pombo, E.; Sanabria Brassart, C.; Zavala Morencos, I. Metodología Para El Estudio de Los Parques Urbanos: La Comunidad de Madrid. *Geofocus Revista Internacional de Ciencia y Tecnología de la Información Geográfica* **2003**, *3*, 160–185.
36. Martinez, L.M.R. Los Parques Urbanos Como Indicadores de Calidad de Vida, Símbolos de Bienestar y Espacios de Uso Recreativo: Una Investigación En Bucaramanga (Colombia). *Univ. Empresa* **2015**, *16*, 215–237. [CrossRef]
37. Qiu, J.; Bai, Y.; Hu, Y.; Wang, T.; Zhang, P.; Xu, C. Urban Green Space Accessibility Evaluation Using Age-Based 2-Step Floating Catchment Area Method. In Proceedings of the IGARSS 2019—2019 IEEE International Geoscience and Remote Sensing Symposium, Yokohama, Japan, 28 July–2 August 2019. [CrossRef]
38. Schüle, S.A.; Hilz, L.K.; Dreger, S.; Bolte, G. Social Inequalities in Environmental Resources of Green and Blue Spaces: A Review of Evidence in the WHO European Region. *Int. J. Environ. Res. Public Health* **2019**, *16*, 1216. [CrossRef]
39. Malczewski, J. *GIS and Multicriteria Decision Analysis*; John Wiley & Sons: New York, NY, USA, 1999.
40. Voogd, J.H. *Multicriteria Evaluation for Urban and Regional Planning*; Pion: London, UK, 1983.
41. Biernacka, M.; Kronenberg, J. Classification of Institutional Barriers Affecting the Availability, Accessibility and Attractiveness of Urban Green Spaces. *Urban For. Urban Green.* **2018**, *36*, 22–33. [CrossRef]
42. La Rosa, D. Accessibility to Greenspaces: GIS Based Indicators for Sustainable Planning in a Dense Urban Context. *Ecol. Indic.* **2014**, *42*, 122–134. [CrossRef]
43. De Sousa Silva, C.; Viegas, I.; Panagopoulos, T.; Bell, S. Environmental Justice in Accessibility to Green Infrastructure in Two European Cities. *Land* **2018**, *7*, 134. [CrossRef]
44. Xiao, Y.; Wang, Z.; Li, Z.; Tang, Z. An Assessment of Urban Park Access in Shanghai—Implications for the Social Equity in Urban China. *Landsc. Urban Plan.* **2017**, *157*, 383–393. [CrossRef]
45. Xu, M.; Xin, J.; Su, S.; Weng, M.; Cai, Z. Social Inequalities of Park Accessibility in Shenzhen, China: The Role of Park Quality, Transport Modes, and Hierarchical Socioeconomic Characteristics. *J. Transp. Geogr.* **2017**, *62*, 38–50. [CrossRef]
46. Rigolon, A.; Toker, Z.; Gasparian, N. Who Has More Walkable Routes to Parks? An Environmental Justice Study of Safe Routes to Parks in Neighborhoods of Los Angeles. *J. Urban Aff.* **2018**, *40*, 576–591. [CrossRef]
47. Rigolon, A. A Complex Landscape of Inequity in Access to Urban Parks: A Literature Review. *Landsc. Urban Plan.* **2016**, *153*, 160–169. [CrossRef]
48. Shen, Y.; Sun, F.; Che, Y. Public Green Spaces and Human Wellbeing: Mapping the Spatial Inequity and Mismatching Status of Public Green Space in the Central City of Shanghai. *Urban For. Urban Green.* **2017**, *27*, 59–68. [CrossRef]
49. Omer, I.; Or, U. Distributive Environmental Justice in the City: Differential Access in Two Mixed Israeli Cities. *Tijdschr. Voor Econ. Soc. Geogr.* **2005**, *96*, 433–443. [CrossRef]
50. Rigolon, A. Parks and Young People: An Environmental Justice Study of Park Proximity, Acreage, and Quality in Denver, Colorado. *Landsc. Urban Plan.* **2017**, *165*, 73–83. [CrossRef]
51. Ibes, D.C. A Multi-Dimensional Classification and Equity Analysis of an Urban Park System: A Novel Methodology and Case Study Application. *Landsc. Urban Plan.* **2015**, *137*, 122–137. [CrossRef]
52. Csomós, G.; Farkas, J.Z.; Kovács, Z. Access to Urban Green Spaces and Environmental Inequality in Post-Socialist Cities. *Hung. Geogr. Bull.* **2020**, *69*, 191–207. [CrossRef]
53. Yu, S.; Zhu, X.; He, Q. An Assessment of Urban Park Access Using House-Level Data in Urban China: Through the Lens of Social Equity. *Int. J. Environ. Res. Public Health* **2020**, *17*, 2349. [CrossRef]
54. Brown, G.; Rhodes, J.; Dade, M. An Evaluation of Participatory Mapping Methods to Assess Urban Park Benefits. *Landsc. Urban Plan.* **2018**, *178*, 18–31. [CrossRef]
55. Byrne, J.; Wolch, J. Nature, Race, and Parks: Past Research and Future Directions for Geographic Research. *Prog. Hum. Geogr.* **2009**, *33*, 743–765. [CrossRef]
56. Fors, H.; Molin, J.F.; Murphy, M.A.; Konijnendijk van den Bosch, C. User Participation in Urban Green Spaces—For the People or the Parks? *Urban For. Urban Green.* **2015**, *14*, 722–734. [CrossRef]
57. Mullenbach, L.E.; Baker, B.L.; Benfield, J.; Hickerson, B.; Mowen, A.J. Assessing the Relationship between Community Engagement and Perceived Ownership of an Urban Park in Philadelphia. *J. Leis. Res.* **2019**, *50*, 201–219. [CrossRef]

urban science

MDPI

Article

Gentrification and Touristification in the Central Urban Areas of Seville and Cádiz

Julio-José Parralejo [1,*] and Ibán Díaz-Parra [2]

[1] School of Geography, University of Seville, 41004 Seville, Spain
[2] Department of Human Geography, Faculty of Geography and History, Rectorate Campus, University of Seville, 41004 Seville, Spain; ibandiaz@us.es
* Correspondence: juliojparralejo@gmail.com

Abstract: Intensive tourism in historic city centers is causing socio-spatial effects that are already visible to society. This has led politicians and academics to focus on the issue, creating a debate about gentrification in certain central urban areas which overlaps with studies on touristification, understood by some authors as tourism gentrification. This article aims to identify whether socio-demographic changes identifiable as touristification have occurred in the historic centers of two Andalusian cities, Seville and Cádiz, and which we interpret as the replacement of residents with visitors. The work is based primarily on the exploratory analysis of socio-demographic data from the Population Register and data on housing and rentals provided by different sources. The work shows strong indications of a relationship between the increase of tourist apartments and losses of residents in both historic centers. The paper concludes by pointing to the need for further research on this relationship in public statistics that can guide future policy action.

Keywords: gentrification; touristification; tourist housing; Airbnb; historic center; population

Citation: Parralejo, J.-J.; Díaz-Parra, I. Gentrification and Touristification in the Central Urban Areas of Seville and Cádiz. *Urban Sci.* **2021**, *5*, 40. https://doi.org/10.3390/urbansci5020040

Academic Editors: Deborah Edwards and Frank Witlox

Received: 15 February 2021
Accepted: 29 April 2021
Published: 2 May 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

In recent years, there has been increasing concern about the impact of intensive tourism, both politically and academically. This has been especially noticeable in southern European cities such as Athens, Barcelona, Lisbon, and Rome, among others. Ref [1] Spain's status as a tourist power has increased the prominence of this type of process.

Ref [2] This type of impact has attracted the attention of the World Tourism Organization and the European Parliament. Although concern about the impact of tourism is not new, the recent focus is in response to an intensification of tourist flows and the expansion of tourism processes into new areas. There may be several reasons for this. For relatively poor regions, tourism has become the main way of attracting economic resources [3]. Furthermore, in recent years, the role of certain innovations in the tourism sector has developed or strengthened with a significant impact, such as low-cost airlines, cruise tourism, and the more recent emergence of online platforms that offer tourist accommodation [4,5]

In this way, tourism has become the main source of income for many cities in the country, leading to the professionalization of the sector and the increasing use of new technologies [6] that can offer high quality services and enable access from different social classes, in addition to the strong internationalization that has been growing in recent years. Since the economic crisis of 2008, tourism has gained even more prominence in job creation and in its share of the GDP [7]. This has coincided with some social alarm about the saturation of visitors in certain cities, especially in historic centers, with particular attention to the growth of tourist apartments [8,9]. The impact of temporary tourist rentals and Airbnb-type platforms has changed consumption patterns in the tourist accommodation sector [10]; while multiplying the possibilities for tourists to visit cities and access a wide range of experiences, it has been able to boost the number of tourists, both in traditionally touristy and non-touristy cities, leading to some congestion and competition for space with

conventional rentals in the most visited historic areas. This brings up the issue of the need for state regulation of these activities [11].

The term *touristification*, which can be defined as the ongoing transformation of urban environments from tourism and tourists, has become especially popular in Spanish academia in the last five years and is closely linked to the studies on gentrification in the central areas of large cities that were starting to be developed a decade ago. This narrative mostly originated from the idea of tourism gentrification, which was first introduced by Gotham [12] and has since been followed up by many researchers [13,14].

Questioning the appropriateness of talking about tourism gentrification, Jover and Díaz-Parra [15] argue for the need to differentiate traditional residential gentrification and touristification, given that, despite responding to similar mechanisms, these two processes would have different demographic effects. According to Clark [16], gentrification refers to the phenomenon of the substitution of residents and users of a certain urban sector for others who have greater purchasing power, mediated by investment in the built environment of the traditional population of a neighborhood. This element would respond to the classic conceptualization of Smith [17], who explained gentrification as a consequence of the reinvestment of real estate capital in previously devalued areas—the main driver of this transformation being the benefit derived from the increase in land rents, which is called the rent gap. The notion of transnational gentrification, by contrast, can be interpreted as the process of new residents with higher status coming from other countries. Touristification, on the other hand, could be seen as a substitution for tourists and occasional visitors rather than for new households of a higher social class than the pre-existing ones [18]. Jover and Díaz-Parra [15] highlight this difference, insofar as touristification, unlike gentrification, should lead to some depopulation (in relation to established residents). Other authors point to the lack of evidence on the relationship between tourist rentals and population displacement [19]. In turn, ref [20] speak of a tourist rent gap that would place the driving force of the process in the existing difference between conventional rentals and tourist rentals.

This work is part of a broader doctoral study on the processes of gentrification and touristification in the Andalusian cities of Cádiz and Seville. The first part of the project is mainly focused on the exploratory and descriptive analysis of the impact of the intensification of tourist uses on housing, and the structure and socio-demographic evolution of the central areas of these cities.

Figure 1 shows where the historic centers of Seville and Cádiz are located within their municipalities.

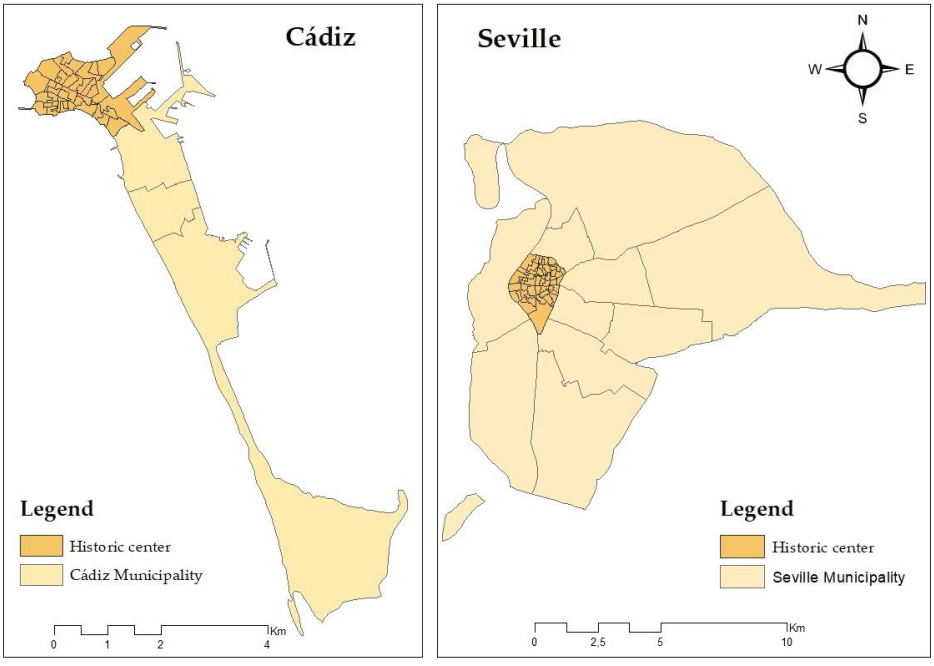


Figure 1. Historic centers of Seville and Cádiz. Source: Prepared by the authors with data from the IECA [21].

The cases of Seville and Cádiz are of considerable interest. Both are tourist cities with large historic centers that have become important economic resources for the local economy, with a recognized history and evolution in recent decades. By studying Seville (an inland city) and Cádiz (a coastal city), the study can be extrapolated to other cities with similarities to Seville and Cádiz. Seville, with around 690,000 residents [22], is the Andalusian city with the highest number of tourist dwellings and the second city in Spain, after Madrid. It has the largest proportion of residential dwellings dedicated to tourist use in its historic center and receives almost 3 million visitors a year. On the other hand, Cádiz, with more than 116,000 residents [22], occupies a more secondary position with respect to the number of tourist apartments, but it is the city where cruise tourism has grown the most in recent years, outside the island territories, reaching more than 260,000 visitors.

After this short introduction, which includes a brief state of affairs, the work includes a methodological section which describes the steps followed in the analysis, sources used, and justification of the different indicators. The results are presented below, where we comparatively and consecutively explore, firstly, the data on tourist dwellings and housing uses and, secondly, the socio-demographic evolution of the population. The article ends with a brief conclusion section.

2. Methodology

An exploratory comparative analysis will be carried out between the two cities. This analysis is divided into two distinct parts. The first part focuses on data on housing and tourist rentals. The second part analyses the socio-demographic changes in these cities. The study area is defined by the municipal districts of both cities and, within these, the historic centers, defined by their walled enclosure. The study period covers the development of these cities during the 21st century, starting in 2001, the date of the penultimate population and housing census, and ending in 2018, the date on which the latest census data was published by the Andalusian Institute of Statistics and Cartography. The temporality of

the data varies according to the source. It is possible to obtain the demographic data for each year between 2001 and 2018, while the housing data are mostly provided only synchronously for 2018.

The analysis of demographic statistics is based on the hypothesis that the increase in tourist apartments, as a result of the impact of platforms such as Airbnb [23], could put a brake on the trend of the last two decades in Andalusian historic centers. This could lead to a reversal, or at least a halt to the demographic decline they have been experiencing since the second half of the 20th century. These previous gains would be the result of a process of gentrification, so touristification and gentrification would have contradictory effects on this type of space.

The study of housing draws on a variety of sources. Firstly, we use the information provided by the population and housing census, which has the known limitation of its periodicity, so we only have data from 2001 and 2010. However, it does offer some interesting information on the use of housing. The data on tourist dwellings are based on the compilation of data on the Datahippo platform [24]. At present, Datahippo does not provide time series, so only stock data are available. The impact of online platforms that allow the transformation of dwellings into tourist apartments (Airbnb, Homeaway, etc.) is limited to the last five years and the official registers only started to operate a couple of years ago, when it became mandatory to declare dwellings for tourist purposes [25]. For the impact of tourist rentals operating via digital platforms, the reference date is 2012, the year in which Airbnb went international and opened its first office in Spain (Barcelona).

The difference between conventional and tourist rentals, understood as a proxy for the aforementioned tourist rent gap [20], has been taken as an explanatory variable. The data on conventional rentals have been extracted from the website Idealista.com [26]; the data on tourist rentals were taken directly from the Airbnb platform. Both were used to identify the average prices of tourist rentals in the historic centers of these cities. The obstacle to the tourist rental price data is the extreme variability of rental prices throughout the year. This has been partially overcome by obtaining the data for different periods of the year (high season and low season). For this, it has been necessary to make two assumptions in order to compare the two types of rentals. First, it has been assumed that there are three months of the high season and nine months of the low season. In the high season, Seville can exceed 500,000 overnight stays and Cádiz 67,000 according to data from the Hotel Occupancy Survey (EOH) [27] of the National Statistics Institute (INE 2018). The specific high season data for both cities have been obtained from two festivals declared of International Tourist Interest, which is an honorary distinction granted in Spain by the General Secretariat of Tourism of the Ministry of Industry, Tourism, and Trade. The festival in Seville is the traditional Easter festival, with more than 90% hotel occupancy according to the Seville and Province Hotel Association [28]. On the other hand, the festival in Cádiz is the famous Carnival, celebrated in the city where hotel occupancy reaches 95% according to the Federation of Hotel Businessmen of the Province of Cádiz [29]. The other assumption is that the tourist dwelling would be rented for the whole month in the three months of high season and half of the month in the nine months of low season.

In view of the lack of data on the size of tourist rentals, the rentals in two-bedroom dwellings were compared. The differences for the types of housing and different times of the year are used to extract an average, an indicator that would roughly reflect the difference in profits between conventional and tourist rentals as a driver of touristification. It should be borne in mind that it is intended to approximate the benefit of renting a property, although real estate, administrative, or fiscal costs should also be taken into account to obtain a more realistic figure.

Table 1 below gives the indicators of the first part of the work to be analyzed.

Table 1. Housing indicators.

Phenomenon	Indicator	Obtaining of the Indicators
Evolution in the number of secondary dwellings	% of secondary dwellings (2001–2011)	[(Secondary Housing 2011 × 100)/Total Housing 2011] − (Secondary Housing 2001 × 100)/Total Housing 2001]
Underutilization of the housing stock	% of empty dwellings (2001–2011)	[(Empty housing 2011 × 100)/Total housing 2011] − [(Empty housing 2001 × 100)/Total housing 2001]
Tenancy percentage	% of rental housing over main housing units (2001–2011)	[(Rental housing 2011 × 100)/Main housing 2011] − [(Rental housing 2001 × 100)/Main housing 2001]
Touristification of housing	% of tourist accommodation as a percentage of total accommodation	(Tourist rental housing in the historic center × 100)/Total housing in the historic center
Centralization of tourist housing	% of tourist rentals in the municipality that are located in the historic center	(Tourist rental housing in the historic center × 100)/Total Tourist rental housing in the municipality
Tourist Rent Gap	Difference between the average price of conventional rentals and the average price of tourist accommodation	[(Average annual rent for tourist rentals−average annual rent for conventional rentals) × 100]/average annual rent for conventional rentals

For the socio-demographic dimension, data were obtained from the Population and Housing Census of 2001 and 2011 and from the Population Register, between 2001–2018, provided by the National Statistics Institute (INE) and the Andalusian Institute of Statistics and Cartography (IECA). The Population and Housing Census has the advantage of presenting data on socio-occupational status and educational attainment, which can be used as a proxy for the status of the population in a given urban sector.

The gentrification indicator is constructed from the variation in the percentage of the population with professional and technical occupations. The so-called Marcuse index is used [30], where the operational definition is the relative change of a socio-economic group in the area in question, minus the relative change of the same group in the city. This allows us to know whether, in a given area, a social group that is contextually considered privileged has grown at a faster or slower rate than that of the city. The transnational gentrification indicator again uses Marcuse's index, but it takes as a privileged group the foreign population from the EU-15, the US and Japan, which would reflect what is generally recognized as core countries or countries with a higher level of development. This is a rather uncontroversial choice if we are talking about the first decade of the 21st century.

Table 2 presents the socio-demographic indicators, which is the second part of the work to be analyzed.

Table 2. Socio-demographic indicators.

Phenomenon	Indicator	Obtaining of the Indicators
Population variation	Population living in the historic center (2001–2018)	Resident population 2001–resident population 2018
Demographic percentage of the historic center	% of population living in the historic center (2001–2018)	Resident population in the historic center × 100)/Total population in the municipality
Ageing of the historic center	% over 65 (2001–2018)	(Older than 65 years × 100)/Total population
Transnationalization of the central areas	% of foreigners in the historic center (2001–2018)	(Total foreign population × 100)/Total population
Gentrification	% of people with higher education in the center compared to the increase in the city as a whole	(Adult population with university education × 100)/Total adult population
Transnational gentrification	% from countries with high HDI in the center compared to increase in the city as a whole	(Foreigners from EU-15, USA, Canada and Japan × 100)/Total Population

3. Results

The results of the descriptive analysis of the housing and socio-demographic indicators are shown below. Starting with the analysis that shows the use of the housing stock in the historic centers of Seville and Cádiz, the existing concentration of tourist rentals and the difference in the income generated by tourist rentals are compared to conventional rentals. Next, the changes in the population of the historic centers are observed, studying processes of a socio-demographic nature. This will allow us to launch hypotheses, in the conclusions section, on the relationship and the differences between the two case studies.

3.1. Tourist Housing and Rent Differential

Table 3 represents the amount of secondary, empty, and rented dwellings and their variation between the last two population censuses.

Table 3. Percentage of secondary, empty, and rented dwellings in Seville and Cádiz and their historic centers (2001–2011). Source: Prepared by the authors with data from population and housing census 2001–2011 [31].

	% Secondary Dwelling			% Empty Dwelling			% Rental Housing		
	2001	2011	Δ2001–2011	2001	2011	Δ2001–2011	2001	2011	Δ2001–2011
Cádiz	6.14	9.03	+2.89	10.36	11.62	+1.25	31.59	24.85	−6.74
Cádiz HC	3.90	6.80	+2.91	14.76	19.72	+4.96	54.99	44.90	−10.80
Seville	7.22	6.11	−1.11	14.71	14.29	−0.42	10.35	11.81	+1.46
Seville HC	9.09	9.10	+0.01	29.27	24.37	−4.90	26.52	27.04	+0.52

As usual in Andalusian cities, the greatest percentage of rentals in both cities is concentrated in their respective historic centers. However, the percentage of rentals is much greater in the case of the historic center of Cádiz, where it oscillates around half of the main dwellings, while in Seville it is above a quarter.

Furthermore, there is a much greater proportion of secondary and empty dwellings in the case of the historic center of Seville than in the case of Cádiz. In Seville, the intercensal period marks a certain residential dynamism, as the proportion of empty housing diminishes and secondary housing remains stagnant, while rental housing increases slightly, although less than in the city as a whole. The opposite is true in Cádiz, where renting is falling, losing up to 10 points in the historic center, and the percentage of vacant and secondary dwellings is increasing. Developments in Seville seem to correspond to demographic growth, rejuvenation, and increase of the foreign population in the first decade of the 21st century, from 7180 foreigners in the city in 2001 to 39,000 in 2013, as can be seen in the data provided by the Population Register of the National Institute of Statistics. This brings into play a greater number of dwellings, many of which are rented. In the case of Cádiz, the real estate market in this period seems to be increasingly directed to other forms of tenure, mainly ownership, and also to secondary dwellings.

We continue our work with Table 4, which analyzes the touristification of housing and centralization of tourist housing.

Table 4. Touristification of housing and centralization of tourist housing (2019). Source: Prepared by the authors with data from Datahippo.

	Total Number of Tourist Dwellings	Centralization of Tourist Housing	Touristification of Housing
Historic Center of Cádiz	897	61.61	6.51
Historic Center of Seville	4840	65.20	18.24

Table 4 shows that the number of tourist dwellings varies greatly between the historic center of Cádiz and that of Seville, and is much higher in the latter, reflecting its larger size in terms of surface area and population. The indicator of the centralization of this type of dwelling, which aims to reflect the proportion of the total number of tourist rentals in the

municipality that are located in the historic center, reveals a similar figure, with over 60% of this type of housing concentrated in the historic centers, which shows the prominence of tourist housing in this type of space.

Finally, the touristification of housing shows a much higher figure in Seville, up to 18.24 points, compared to 6.51 points in the historic center of Cádiz, which implies that, in the historic center of Seville, tourist housing was approaching 20% of the total housing stock (main and other types). Through Airbnb and Idealista, we searched for an approximation of the difference in rent between the value of conventional rentals and tourist rentals. The data was calculated on an annual basis. It was calculated for dwellings with two bedrooms. Taking into account the strong seasonal variation of tourist rentals, the difference between high and low season was calculated. It should be recalled that the dates used to calculate the high season were Carnival in Cádiz and Easter in Seville. Two significant assumptions are made here. First, it is assumed that there are three months of high season in both cities. Second, it is assumed that the tourist accommodation would be rented for the whole month in the high season and half of the month in the low season.

We continue with Table 5, which shows the difference in profit a tenant would make between a conventional and a tourist rental.

Table 5. Annual rent differential in two-bedroom homes. Source: Prepared by the authors with data from Airbnb and Idealista.com.

	(A) Tourist Rentals Annual Average	(B) Conventional Rentals Annual Average	A−B	[(A−B) × 100/A]
Historic Center of Seville	€30,832.68	€12,943.68	€17,889	58.02%
Historic Center of Cádiz	€31,593.24	€7872	€23,721.24	75.08%

In the center of Seville, there is a difference of 58.02% more profit for the tourist rental of a property, while in the historic center of Cádiz the difference is even greater, reaching 75.08%. This difference justifies the move from conventional rentals to tourist rentals. These benefits would multiply in the months with the greatest influx of tourists. For a month during high season in Seville, the lessor would obtain €5000 more profit on average than a conventional rental. This difference, in Cádiz, amounts to more than €7000.

3.2. Socio-Demographic Changes and Gentrification

During the second half of the 20th century, the historic centers of the cities of Seville and Cádiz were experiencing strong population decline. They were generally losing population to other neighborhoods in their respective cities or to their metropolitan areas and were ageing markedly. Urban renewal in this type of historic centers, which is widespread in cities of a certain size in Spain, took place from the 1990s onwards [32].

The data on the historic centers of Seville and Cádiz are shown in Table 6.

In Table 6, we can see how the historic center of Cádiz has more population weight than Seville, despite the fact that Cádiz has lost inhabitants and Seville has gained them. 30.01% of the city's total population still lives in the historic center of Cádiz, while in Seville the figure is only 8.19%. Beyond this, the behavior of the two historic centers is notoriously dissimilar. The historic center of Cádiz has continued to lose population by more than 6700 inhabitants for the whole period. The loss of the demographic percentage of the historic center was very rapid in the first years of the 21st century. However, these losses in favor of the city as a whole have slowed down since 2009, gaining a greater proportion between this year and 2012 only to fall again from this date onwards, albeit slightly.

Table 6. Changes in the population of the historic centers of Cádiz and Seville. Prepared by the authors with data from the Population Register and the National Statistics Institute (INE).

	Year	Historic Center of Seville	Historic Center of Cádiz
Population variation	2001	52,840	41,819
	2018	56,419	35,111
	Δ2001–2018	+3579	−6708
% Demographic percentage of the historic center	2001	7.52	31.36
	2018	8.19	30.01
	Δ2001–2018	+0.67	−1.35
% Ageing	2001	20.37	36.25
	2018	20.19	28.38
	Δ2001–2018	−0.18	−7.87
% Transnationalisation	2001	1.96	0.55
	2018	6.24	2.67
	Δ2001–2018	+4.27	+2.12

In this process, the ageing of the population decreased notably, from 36% to 28% of the population, and was also accompanied by an increase in the transnationalisation of the historic center, albeit a very moderate one. In Seville, on the other hand, the demographic percentage of the population of the historic center has increased in the period 2001–2018, though only slightly. The population percentage increased notably in the first decade of the 21st century and until 2012, after which it began to decrease in share in the city as a whole. The total number of residents in the historic center of Seville has been increasing significantly, year after year, since the beginning of the 21st century, reaching more than 60,000 residents. This trend has slowed and reversed since 2013, and in this time the number of residents has fallen by 3653, erasing much of the previous growth. During this period, the ageing of the population hardly changed in Seville and there was a greater transnationalization than in the case of Cádiz, although the percentage of foreigners barely surpassed 6% of the population. In Cádiz, ageing has declined more or less constantly; in Seville, while the demographic percentage of the center grew, it also grew younger, but since 2013, when this growth slowed down, it has been ageing again year by year.

On the other hand, it is noticeable how the increase in the proportion of foreigners has been constant from year to year, but has started to decrease in both cities, precisely from 2013 onwards, coinciding in both cases with the halt of previous trends of population increase in Seville or the halting of the demographic decline in Cádiz.

In short, in the case of Seville, there is a clear change in demographic trends, with a turning point in 2012, which is much more subdued in the historic center of Cádiz. In the period prior to 2013, there was a growth in the population, accompanied by an increase in the percentage of the foreign population and a rejuvenation of the population, which implies some kind of replacement of the older population with the entry of new settlers, young people and with a certain proportion of foreign population. The case of Cádiz is similar, but this process only allowed for a certain slowdown of the population decline between 2005 and 2012. The subsequent population decline from 2013 onwards in the historic center of Seville implies a loss of the foreign population and a new ageing, which indicates that the population lost in this period is a young population that includes foreigners. This last point can also be extended to the historic center of Cádiz, although in this case the ageing process did not stop during the entire series of data.

The following table shows the indicators of gentrification and transnational gentrification in the historic center of Seville and Cádiz.

In Table 7, the gentrification rates show a positive variation during the study period for both cases, although the increase is rather mild. The general gentrification rate is higher in the historic center of Cádiz, above 4%, coinciding with an increase of one point in the percentage of professionals and technicians over the total population of working age.

Table 7. Gentrification and transnational gentrification. Source: Prepared by the authors with data from population and housing census 2001–2011, the Population Register and the National Statistics Institute (INE).

	Gentrification Rate 2001–2011	% Professionals and Technicians Δ2001–2011		Transnational Gentrification Rate 2001–2018	Foreigners EU-15, USA, Canada and Japan Δ2001–2018
Historic Center of Cádiz	4.15	21.23% 22.31%	+1.08	0.38	+0.73
Historic Center of Seville	1.91	51.42% 52.06%	+0.67	1.60	+1.97

In the case of Seville's historic center, the index is slightly below 2%, reflecting a smaller increase in this group. It should be noted that, for this period, the historic center of Seville is characterized as a very privileged sector compared to that of Cádiz, with more than half of the population employed in professional trades—a percentage that is less than a quarter in the case of Cádiz. Leaving aside the issue of the great internal diversity that exists in both historic centers, this could point to an earlier process of gentrification in the case of Seville, as the available literature indicates [33]. In the case of transnational gentrification, the opposite seems to be the case. It also has positive values. However, transnational gentrification this time is much higher in the case of the historic center of Seville, where it is 1.6%, corresponding to a notable increase in the percentage of foreigners from the most developed countries. In Cádiz, the figure is much lower and remains at 0.38%.

The data in Table 7 add a certain nuance to the previous observations on population change in the two historic centers under study. The population that has promoted growth and rejuvenation during certain periods has been a socially privileged population, which would imply a degree of gentrification of the sector that is more noticeable during the study period in Cádiz, and even a degree of transnational gentrification that would be more significant in Seville.

4. Conclusions

The high number of tourist dwellings and the difference in income between tourist housing and conventional rentals could be the main variable explaining the population losses in these historic centers in recent years. The impact of the growth of this type of tourist accommodation since 2012 is directly related to population losses, especially in Seville, thus reversing previous trends. On a statistical level, there is a relationship between socio-demographic and housing use structures and the distribution of tourist rentals, with the most explanatory variables being proximity to the center, housing uses and the presence of foreign population from countries with a high socio-economic level.

It has been possible to demonstrate that since 2013 there has been a loss of population in the historic centers of both cities that coincides with a clear irruption of digital tourist rental platforms, as already proposed by other authors such as Postma and Schmuecker, [5] and Veiga et al. [4], giving strength to the hypothesis that the high number of tourist homes and the difference in rent may be a reason for the process of touristification, as already indicated by Wachsmuth and Weisler [20].

At the same time, the high level of housing touristification in Seville coincides with a certain degree of transnational gentrification, which initially seems to be a logical relationship between the presence of foreign residents from wealthy countries and the supply of temporary accommodation for visitors from these same countries. In Seville, the phenomenon of touristification as the substitution of residents for visitors is clearer, but Cádiz has certain elements that make it more vulnerable. This is mainly due to the fact that its historic center is home to a population of lower status and with a greater share of tenants, which reduces its capacity to compete for residential space in the area and increases the risk of involuntary displacement.

The hypothesis of a link between touristification and population loss is strengthened by this work. However, in order to infer a cause-effect relationship between the increase in temporary tourist apartments and population losses, it would be necessary to have time series data on the former and to apply some kind of linear regression at a high level of disaggregation within historic centers, which could be a future line of work.

The relationship between gentrification and touristification is also a complex issue. From the outset, there seems to be a certain correlation between transnational gentrification and touristification. Nevertheless, in general terms, gentrification associated with the rejuvenation of historic city centers seems to precede and may even be negatively affected by the loss of residents, which affects young households as well as foreign households. Regarding whether or not this type of process is beneficial, although the main virtue of gentrification may have been the rejuvenation and reversal of the demographic decline of historic centers, the intensification of these dynamics related to touristification may be undermining these small gains. This is a point that needs to be further elaborated upon in the future development of this research.

Author Contributions: Conceptualization, formal analysis, investigation, methodology, writing—original graft, writing—review & editing, J.-J.P.; Conceptualization, formal analysis, investigation, methodology, supervision, I.D.-P. All authors have read and agreed to the published version of the manuscript.

Funding: This research received no external funding.

Institutional Review Board Statement: Not applicable. The study does not include humans or animals.

Informed Consent Statement: Not applicable.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Marchena Gómez, M.; Vera Rebollo, J.F. Turismo y Desarrollo: Un planteamiento actual. *Pap. Turisme* **1990**, *3*, 59–84. Available online: https://idus.us.es/xmlui/bitstream/handle/11441/47549/turismoydesarrollounplanteamientoactual.pdf?sequence=1 (accessed on 26 March 2019).
2. Peeters, P.; Gössling, S.; Klijs, J.; Milano, C.; Novelli, M.; Dijkmans, C.; Eijgelaar, E.; Hartman, S.; Heslinga, J.; Isaac, R.; et al. Research for TRAN Committee-Overtourism: Impact and Possible Policy Responses. October 2018. Available online: https://www.europarl.europa.eu/RegData/etudes/STUD/2018/629184/IPOL_STU(2018)629184_EN.pdf (accessed on 10 April 2019).
3. Capocchi, A.; Vallone, C.; Pierotti, M.; Amaduzzi, A. Overtourism: A Literature Review to Assess Implications and Future Perspectives. *Sustainability* **2019**, *11*, 3303. [CrossRef]
4. Veiga, C.; Santos, M.C.; Águas, P.; Santos, J.A.C. Sustainability as a key driver to address challenges. *Worldw. Hospitality. Tour. Themes.* **2018**, *10*, 662–673. [CrossRef]
5. Postma, A.; Schmuecker, D. Understanding and overcoming negative impacts of tourism in city destinations: Conceptual model and strategic framework. *J. Tour. Futures* **2017**, *3*, 144–156. [CrossRef]
6. Chamorro, R. Una revolución en el turismo gracias a las TIC. *Rev. Bit.* **2008**, *170*, 30–33.
7. Cuadrado Roura, J.R.; Lopez Morales, J.M. El Turismo en la Recuperación y el Equilibrio Exterior de España. *Papeles de Economía Española* **2018**, 154–171. Available online: https://dialnet.unirioja.es/servlet/articulo?codigo=6752653 (accessed on 12 April 2019).
8. Cócola Gant, A.; Durán, G.; Janoschka, M. La ciudad del siglo XXI: Políticas públicas urbanas, desplazamientos y contestaciones. *Íconos-Revista de Ciencias Sociales* **2016**, *11*. [CrossRef]
9. Gil, J.; Sequera, J. Expansión de la ciudad turística y nuevas resistencias: El caso de Airbnb en Madrid. *Rev. Metodol. Cienc. Sociales.* **2018**, 15–32. [CrossRef]
10. Ortuño, A.; Jiménez, J.L. Economía de plataformas y turismo en España a través de Airbnb. *Cuad. Económicos de ICE* **2019**, 133–153. [CrossRef]
11. Milano, C. Overtourism, malestar social y turismofobia. Un debate controvertido. *PASOS Rev. Turismo y Patrimonio Cult.* **2018**, *18*, 551–564. [CrossRef]
12. Gotham, K.F. Tourism gentrification: The case of New Orleans' vieux carre (french quarter). *Urban Stud.* **2005**, *42*, 145–176. [CrossRef]
13. Cocola gant, A. Gentrificación y desplazamiento: Desigualdad urbana en ciudades del capitalismo tardío. *Man. Geogr. Urbana* **2019**, 297–310. [CrossRef]
14. Füller, H.; Michel, B. "Stop Being a Tourist!" New Dynamics of Urban Tourism in Berlin-Kreuzberg. *Int. J. Urban Reg. Res.* **2014**, *38*, 1304–1318. [CrossRef]

15. Jover, J.; Díaz-Parra, I. Gentrification, transnational gentrification and touristification in Seville, Spain. *Urban Stud.* **2019**, 1–16. [CrossRef]
16. Clark, E. The order and simplicity of gentrification: A political challenge. *Gentrification Read.* **2004**, 24–29. [CrossRef]
17. Smith, N. La nueva frontera urbana. Ciudad revanchista y gentrificación. *Trans. Inst. Br. Geogr.* **1996**, *20*, 236–247. Available online: https://www.traficantes.net/sites/default/files/pdfs/Lanuevafronteraurbana-TdS.pdf. (accessed on 14 March 2019).
18. Cócola Gant, A. Boletin sobre el turismo reponsable. *Tursimo y Desarro.* **2015**, *15*, 12.
19. Horna, K.; Merantea, M. Is home Sharing Driving Up Rents? Evidence from Airbnb in Boston. *J. Hous. Econ.* **2017**, *38*, 14–24. [CrossRef]
20. Wachsmuth, D.; Weisler, A. Airbnb and the rent gap: Gentrification through the sharing economy. *Environ. Plan. A* **2018**, *50*, 1147–1170. [CrossRef]
21. Andalusian Institute of Statistics and Cartography (IECA). Spatial Reference Data of Andalusia (DERA). Available online: www.juntadeandalucia.es/institutodeestadisticaycartografia (accessed on 14 February 2020).
22. National Statistical Institute (INE). Population Register. Available online: www.INE.es (accessed on 18 March 2019).
23. Airbnb. Accommodation. Available online: www.airbnb.es (accessed on 10 February 2019 and 30 February 2019).
24. DataHippo. Tourist dwellings. Available online: https://datahippo.org/es/ (accessed on 10 January 2019).
25. de Andalucía, J. BOJA Decreto 28/2016, de 2 de febrero, de las viviendas con fines turísticos y de modificación del Decreto 194/2010, de 20 de abril, de establecimientos de apartamentos turísticos, de 2 de febrero. Núm.28 página 66. 2016. Available online: https://www.juntadeandalucia.es/boja/2016/28/6 (accessed on 20 December 2018).
26. Idealista. Rental Housing. Available online: www.idealista.com (accessed on 10 February 2019).
27. Miles, M. Encuesta de ocupación hotelera (EOH). Available online: www.ine.es/jaxiT3/Tabla.htm?t=2078) (accessed on 29 March 2019).
28. Hotel Association of Seville and Province. Hotel Occupancy. Available online: www.hotelesdesevilla.com (accessed on 15 May 2019).
29. Federation of hotel and catering businessmen of the province of Cadiz (HORECA). Hotel Occupancy. Available online: www.horecacadiz.org (accessed on 15 May 2019).
30. Rasse, A.; Sabatini, F.; Sarella-Robles, M.; Gomez-Maturano, R.; Cáceres, G.; Trebilcock, M.P. Metodologías de identificación de zonas en gentrificación. Santiago de Chile y Ciudad de México. *Rev. Bitácora Urbano Territ.* **2019**. [CrossRef]
31. National Statistical Institute (INE). Population and Housing Census 2001–2011. Available online: https://www.ine.es/dyngs/INEbase/es/operacion.htm?c=Estadistica_C&cid=1254736176992&menu=resultados&idp=1254735572981 (accessed on 25 March 2019).
32. Díaz Parra, I. Cambios en la geografía social de Sevilla 1981–2001. *Cuad. Geogr.* **2010**, *46*, 139–161.
33. Parra, I.D. Gentrificación o Barbarie? Disciplinamiento y Transformación Social de Barrio de la Alameda de Sevilla 2014. Available online: https://www.academia.edu/7908159/_Gentrificación_o_barbarie_Disciplinamiento_y_transformación_social_de_barrio_de_la_Alameda_de_Sevilla (accessed on 13 March 2019).

urban science

MDPI

Article

Gentrification on the Move. New Dynamics in Spanish Mature Urban-Tourist Neighborhoods

Josefina Domínguez-Mujica [1,*], Jesús M. González-Pérez [2], Juan Manuel Parreño-Castellano [1] and Dolores Sánchez-Aguilera [3]

[1] Department of Geography, University of Las Palmas de Gran Canaria, 35003 Las Palmas, Spain; juan.parreno@ulpgc.es
[2] Department of Geography, University of the Balearic Islands, 07122 Palma, Spain; jesus.gonzalez@uib.es
[3] Department of Geography, University of Barcelona, 08001 Barcelona, Spain; dsanchez_aguilera@ub.edu
* Correspondence: josefina.dominguezmujica@ulpgc.es

Abstract: Mature tourism neighborhoods are a valuable laboratory for the study of socio-urban processes. In them, it is possible to analyze the urban transformations and social changes linked to tourism cycles: those corresponding to the stage of tourism involvement, development, and consolidation; those of stagnation and urban decline; and those of tourism rejuvenation and urban rehabilitation. Currently, there are indications of a fourth cycle, where vacation rentals and the arrival of new groups of foreigners are causing a tourism gentrification process. In this context, the aim of this work is to study the socio-urban transformations of two mature tourism neighborhoods in Palma (El Terreno) and Las Palmas de Gran Canaria (Santa Catalina-Canteras) and detect this tourism gentrification process. The analysis is based on indicators of resident population (total population and foreigners by nationalities), housing (holiday rental market and real estate market), and socio-economic levels (income), which allows us to detect the existence of a new urban-tourism cycle. This, supported by strong investments associated with rehabilitation plans, is producing the substitution of foreigners from the South for those from the North, changing from residential rental to vacation rentals, in a context of elitization.

Keywords: tourist gentrification; real estate market; international migrations; tourist rejuvenation; urban inequality

Citation: Domínguez-Mujica, J.; González-Pérez, J.M.; Parreño-Castellano, J.M.; Sánchez-Aguilera, D. Gentrification on the Move. New Dynamics in Spanish Mature Urban-Tourist Neighborhoods. *Urban Sci.* **2021**, *5*, 33. https://doi.org/10.3390/urbansci5010033

Received: 21 January 2021
Accepted: 12 March 2021
Published: 17 March 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction: Tourism Development from an Urban Perspective

The capitals of Mallorca and Gran Canaria are island cities that have developed an early tourist activity since the late nineteenth century. From the fifties of the twentieth century, they responded to mass tourism, increasing their hotel and extrahotel offer in certain neighborhoods like El Terreno, in Palma, and Santa Catalina-Canteras, in Las Palmas de Gran Canaria. As tourism activity gained importance in other locations of the respective islands, investments in these urban sectors were reduced, and the accommodation infrastructure began to deteriorate. "The elite tourism of the first stage gave way to a mass tourism in the fifties and sixties and to a situation of deep crisis and reconversion since the mid-seventies" [1] (p. 16).

The post-Fordist restructuring of the 1980s and 1990s contributed to the decline of these neighborhoods from the perspective of leisure exploitation and it had important implications for the residential offer. The real estate market revalued some properties of old tourist use, reconverting them into housing, especially those on the seafront, while putting into circulation some of those already obsolescent, for the non-tourist rental market.

From the mid-1990s onwards, a part of the rental housing was occupied by low-income labor immigrants. Therefore, the urban-tourist situation of both neighborhoods showed their uncertain adaptation to the post-Fordist model, with a growing ethnicization, in a

degraded real estate context, despite the administrative initiatives undertaken to improve the public space.

The decline continued well into the 21st century due to the impact of the 2008 economic crisis and onwards. Therefore, the urban-tourist offer was made up of main homes, typical of consolidated neighborhoods; rental homes, of poor quality, which came mostly from the residential reconversion of old tourist properties; smaller tourist establishments; and some large capacity four- and five-star hotels, and some others of lesser size and condition.

However, in the last seven or eight years, a process of real estate revaluation has been unleashed. Different agents in the tourism and financial real estate markets as well as companies in the so-called collaborative economy have begun to operate in the tourism rental market because of business opportunities and new acquisition strategies [2]. This process is bringing about definitive changes in the housing infrastructure of these neighborhoods, contributing to the reduction of the number of homes and displacing low-income population groups in favor of residents with higher incomes. Namely, a process of elitization develops, as considered by authors such as Lees, Shin, and López-Morales, [3] who define gentrification as a social substitution in the urban space through which the population of an area or neighborhood is displaced and replaced by another one with higher purchasing power. In general, this is the result of the revaluation of the property prices and rents that exceed the residents' income.

Consequently, in these areas an initial stage of new construction and first cycle of use, with housing value rising, may be observed. In the second stage, the depreciation of the properties begins, partially and temporarily avoided by investment in rehabilitation or by changes in the market structure. If the process of loss of value continues, the decline is exacerbated by the sale or rent of properties to increasingly less wealthy social groups. This sometimes leads to a process of social substitution, including changes in the composition of the population by ethnicity or nationality, and precedes the gentrification dynamics, when optimal market conditions for a revaluation to begin are observed [4]. The change in market conditions might be favored by public action, the so-called state-led gentrification [5], or be a consequence of the acquisition strategies of real estate or financial market agents. In any case, this process takes place when market circumstances are such that the rehabilitated or renovated properties allow for a profit margin (rent gap) [6]. In the cases analyzed, tourism and gentrification are mutually reinforcing [7].

1.1. Urban-Tourist Dynamics from the TALC Model

The evolution we have been describing can be contextualized within a neighborhood life cycle and interpreted considering the model that Butler called TALC (tourism area life cycle) [8]. This model studies the evolution of tourism from the economic, social, and cultural point of view and analyzes its territorial development through four tourism peripheries: The North Sea and Baltic coasts, Southern Europe, the North African shores, and the tropical oceans [9,10]. The defense of this model turned Butler's work [11] into one of the most cited works on tourism in the world, if not the most cited [12], and soon after its publication arose criticism [13,14], especially that of the undertheorization of tourism [15].

Despite this, four decades after its appearance, its relevance is undoubted and has demonstrated its potential applications in future scenarios [16], given that the TALC remains a clear indicator of the importance of theory in tourism research [17]. Thus, for Oppermann and Agarwal [18], Butler's model is an example of how scientific progress should work, with the ability to adapt to different contexts and to specific situations and circumstances. This has given it great success, based on its apparent universality, its high degree of applicability [19], and, combined with this, the relative absence of alternative models [16,20].

According to TALC, tourist destinations have a dynamic nature, going through different phases of evolution and, as in the biological/product life cycle, decline is often inevitable [12]. Consequently, the last stage foreseen is the rejuvenation or decline of a destination. This interpretation, which has given rise to numerous controversies [21,22],

may be useful as a descriptive model to analyze the first phases of transformation of the El Terreno and Santa Catalina-Canteras neighborhoods. However, as many authors have pointed out, the model does not explain and predict the behavior of a specific tourist destination after the phase of stagnation [23], since "depending on the efforts of government and entrepreneurship, rejuvenation, stagnation, or decline are possible outcomes" [24]. This does not prevent the model from interpreting some of the rejuvenation plans and policies of mature destinations [19].

In hindsight, Butler [25] defends a blending of both evolutionary and revolutionary predictions in the case of tourism destinations, an approach that allows for the incorporation of ideas such as chaos theory and chance into the equation of growth, to reflect both the inertia and dynamism that are inherent to tourism. This is a dynamic and predictive model that can incorporate agents, phases, and processes. For example, once the maturity stage is reached, Strapp [26] explains the conversion of conventional tourist destinations from second homes to retirement havens, while Baum [27] says that, alternatively, destinations may choose to leave tourism aside entirely as part of its economic development portfolio. For Benner [28], in the absence of exogenous changes due to policy interventions, or public pressure, in a scenario of overtourism, a destination's tourism sector might contract, downgrade, dislocate, and eventually even disappear.

1.2. Urban-Tourist Dynamics from the Perspective of Gentrification

In our case study, that of two mature tourist destinations in the most populous cities of the Spanish archipelagos, we argue for the emergence of a new phase of evolution after decline, associated with a process of gentrification. Although there is evidence of the impact of this process in many Western cities, until now, it had only been recognized as affecting urban areas such as historic centers. Mature tourist centers, at least in Spain, had not been analyzed in the light of this new elitization, although the irreversible trend towards their decline had been anticipated, as Knowles and Curtis [29] predicted at the end of the last century. Vera and Rodríguez [30] also pointed out that mass tourism was the final stage in the evolution of these Mediterranean tourist destinations.

However, an analysis from the perspective of tourism gentrification can complement the previous view. As Gotham [31] has pointed out, until the beginning of the 21st century, most analyses of tourism had ignored the impact of tourism on gentrification processes. The studies carried out by this author in the case of New Orleans [32] have given way to extensive literature that has reviewed the links between gentrification in scenarios as diverse as Berlin [33], Venice [34], Memphis [35], Hanoi [36], China [37], or Spain and Latin America [38–40]. Reflection on the relationship between tourism and gentrification includes contributions centered on the theorization of the role of tourists and their practices as producers of tourist space and as generators of medium- and long-term appropriation conflicts, as Hiernaux and González [41] have pointed out.

Tourist gentrification, notes Cócola-Gant [42], involves a deep mutation of the place in which long-term residents can lose the resources and references by which they define their everyday life. The review of conflicts and the emergence of social movements in the tourist city has focused the attention of a powerful line of studies in which the contributions of Colomb and Novy [43] and Opillard [44] stand out. For their part, Gravari-Barbas and Guinand have highlighted the complex and diverse nature of the relationship and point out that tourism more than ever plays an important role in the economy by being generally associated with city rebirth (renaissance and beautification), revitalization, or urban regeneration [45]. Along these lines, this text argues that in El Terreno and Las Canteras a new phase of evolution has been inaugurated, after the stages of maturity and decline, and that this phase is associated with a socio-urban process of gentrification.

1.3. The Differentiated Urban-Tourist Dynamics in El Terreno and Santa Catalina-Canteras

In general, tourism has gone through waves of expansion and restructuring connected to general techno-economic changes. In the case of Palma and Las Palmas de Gran Canaria,

the recognition of tourism and the tourist industry as a complex network, where different business models compete and co-exist in various ways, is important for our understanding of the dynamics behind recent growth in the observed urban tourism transformations [46]. In this sense, we must consider these two territories do not trail a parallel trajectory in a late stage of evolution since, according to the interpretation of destinations as mosaics or assemblages, each can follow a lifecycle that is different from the other, despite their previous common trajectory [47,48]. That is, each of them must be interpreted as a system evolving by responding to external and internal inputs [49]. This fundamental idea lays the necessary foundation of tourism through the lens of the complexity theory, which underlies systems thinking [50].

In summary, in this article we intend to analyze the recent elitist dynamics that are manifested in the mature tourist neighborhoods of El Terreno, in Palma, and Santa Catalina-Canteras, in Las Palmas de Gran Canaria, considering the synergies between TALC and the life cycle of urban areas. In both cases, processes of revaluation and social displacement are recognized, but with differentiated dynamics that reflect, through a comparative analysis, an image of the processes of gentrification in a late phase of capitalism.

2. Materials and Methods

To characterize the recent socio-urban and tourist dynamics of the mature tourist districts of El Terreno and Santa Catalina-Canteras, we have combined different research sources. First, data from the Continuous Population Register between 2004 and 2019 [51] at a micro spatial level were used. This source is developed based on the exhaustive utilization of the basic variables contained in the Municipal Register on January 1 each year. Among these basic variables, the nationality and place of birth are included for different levels of territorial disaggregation. In our case study, the information is referred to at the lowest possible level of detail, without violating statistical confidentiality, namely the census tracts.

Secondly, information on the socioeconomic level of the population of the neighborhoods studied was considered. In this case, we collected the income data from the Spanish Tax Agency, for the period 2009–19 [52]. The income data are based on the income declared annually by individuals, so it is one of the best possible estimates of the evolution of income at a more detailed scale than at the municipal level, given that it refers to the postal code areas.

Thirdly, data on tourist accommodation was made use of. The National Statistics Institute and the different regional statistics institutes offer information on the hotel and non-hotel tourism offer at the municipal level. The Hotel and Holiday Dwelling Occupancy Survey is a good example of this. Its information allows us to know the evolution of the number of establishments and beds from a time perspective. In this case, as we had to focus the analysis on an infra-municipal scale, we had to resort to the lists of Accommodation Supply of Gran Canaria and Mallorca for 2019, which are produced by the Tourism Boards of the respective islands [53]. These lists show the supply in operation by postal address. The official information was contrasted with the fieldwork and with the data provided by some marketing platforms in relation to holiday homes. Specifically, we consulted the data provided by AIRDNA from platforms such as AirB&B and Vrbo. This portal allowed us to compare the number of dwellings and beds in operation, as well as other data on marketing, using the postal address.

Finally, we also collected information on the evolution of house prices. Official data on housing sales and rental prices in Spain usually only go down to the municipal level and, as we were interested in prices in two specific areas, we resorted to reports from appraisal agencies and electronic agencies. Specifically, we used the data provided by El Idealista.com, which we consider to be the best option for characterizing real estate market trends [54], as they have been provided since 2009, at a district scale.

Therefore, the use of these four main sources allows us to characterize the evolution of the population and residents according to their origin, the income of the resident

population, the supply of tourist accommodation, and the evolution of the sale and rental prices of housing. These are the seven indicators that have been used to analyze the residential and tourist dynamics of both neighborhoods and to detect whether there are processes of gentrification that are leading to the displacement of population according to country of birth (see Figure 1).

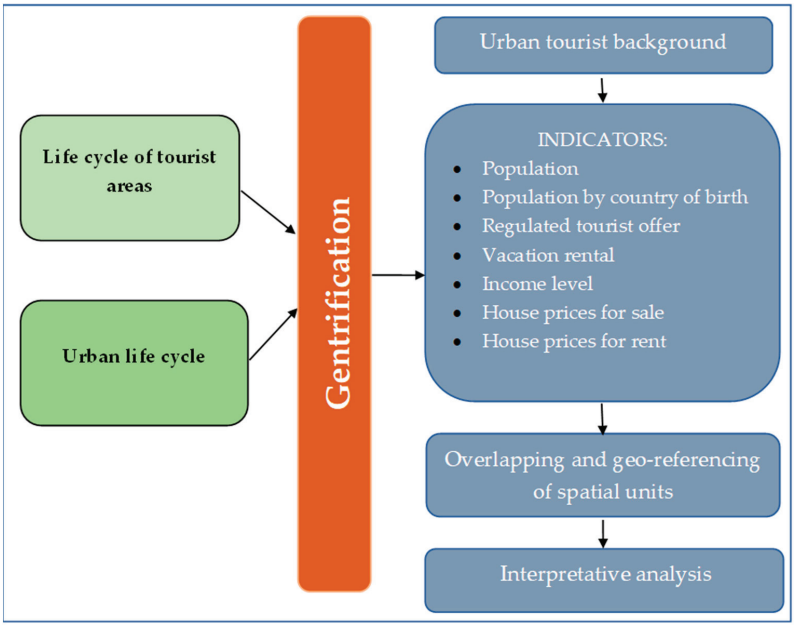


Figure 1. Methodological outline. Own elaboration.

The data provided by these sources have been treated with descriptive statistical procedures, although the greatest difficulty for the selection of information has derived from the different spatial references provided by the different sources at a micro-scale level. Thus, demographic data corresponds to census tracts, tourism data to specific units (real estate), income data to postal districts, and sales and rental prices to districts. To make the analysis possible, we chose to define the boundaries of the neighborhoods according to census sections, which allowed us to work with information from the census. Using a GIS, postcodes and districts were superimposed on the corresponding census sections, selecting the codes and districts with the best territorial fit. Finally, we geo-referenced the tourist accommodation according to postal address, selecting those located within the census sections that had been chosen.

This work procedure allowed us to achieve the following secondary objectives: (i) to characterize the demographic evolution of these neighborhoods, the increase or decrease in population and, especially, the dynamics of immigration according to the geographical origins of their residents; (ii) to analyze the evolution of the housing supply in order to calibrate the weight of tourist establishments and houses for tourist use in the study areas; (iii) to interpret the changes in the socio-economic levels of these neighborhoods; and (iv) to appraise the parallel or non-parallel evolution of housing prices and of the income level of the population. The combination of these objectives let us establish an image of the recent trends in touristification and in the gentrification processes in both neighborhoods, in a late phase of capitalism, which revalues them for new productive uses and consolidates an unequal city: that of investors versus neighbors.

In the following sections, after an in-depth presentation of the study areas and the urban-tourist dynamics that have preceded the recent process of gentrification, the analysis of four of the indicators mentioned in the results section is presented: the dynamics of the regulated and holiday tourism offer and the recent evolution of the population figures and of the contingents according to place of birth. The study of the evolution of property sale and rental prices and per capita income is presented in the discussion section, at the same time as all the results obtained being interpreted in the context of the theories put forward. We conclude with a presentation of the similarities and discrepancies that both destinations seem to have in the interpretative framework indicated.

3. Geographic Areas of Study and Urban-Tourist Dynamics

The evolution of both neighborhoods is closely related to the tourist activity, practically from its origins. For that reason, we must begin by characterizing its development process, talking about urban dynamics and about urban-tourist dynamics.

3.1. Santa Catalina-Canteras

This neighborhood is located at the northern end of the isthmus of Guanarteme and sits on the tongue of sand that covers the lava flows from the Holocene volcanic cones of the peninsula of La Isleta, which connect it to the rest of the island of Gran Canaria (Figure 2).

Figure 2. Aerial perspective of Santa Catalina-Canteras. Source: Own elaboration.

It is a neighborhood delimited by the Las Canteras beach, to the west of the isthmus, and by the enclosure of the port of La Luz, to the east, the most important mid-Atlantic port and one of the Spanish ports with the most traffic [55].

The process of urbanization of this isthmus was delayed until the end of the 19th century, when the first dock began to be built, the Santa Catalina dock (1883) [56]. Around the same time, tourism specialization also began, since some local bourgeoisie and aristocratic owners began to erect summer homes, and other foreign investment initiatives, such as those in spas, were added. The occupation of the area was done through a procedure of expansion with an orthogonal grid adapted to low buildings.

Since the 1960s, there has been a proliferation of urban-tourist renovation projects that have led to a significant increase in the number of buildings. A large part of these new buildings corresponded to hotels and apartment complexes. Most of these establishments were erected without a parcellation process, resulting in a medium sized tourist structure. However, on other occasions, a re-parcellation process was carried out, promoted by large

companies, with the inauguration of large hotels in buildings of great volume or height (e.g., the "Hotel Don Juan", opened in 1968, with 26 floors, or the Hotel Cristina, with 14 floors and 28,000 m^2, among others), to meet the demand of mass sun and beach tourism from Northern and Western Europe [6].

In the mid-seventies, the city had more than 33,000 beds [57], most of them located in the Santa Catalina-Las Canteras neighborhood. However, from that date on, the flow of tourists to the city began to lose importance in favor of the new destinations located in the south of the island [58,59]. As a result, some establishments, especially extra hoteliers, and hotels with lower status or further from the beach, were reconverted into residential or office buildings. This process of progressive loss of the tourist function continued for more than two decades, so that in 2001 the municipality had only 7700 beds.

Today, Santa Catalina-Canteras can be considered a hybrid neighborhood, which is structured around Las Canteras beach on its western side, and around the port facilities on the eastern side. Over the last two decades, public investment has focused on the growth and remodeling of public space for pedestrian use and the creation of port facilities for the reception of cruise ships. For its part, private investment has generated, in addition to new or rehabilitated properties for residential use, urban-tourist facilities of great centrality (El Muelle shopping centre, Poema del Mar Aquarium). Therefore, the neighborhood is currently a dynamic space in which residential, commercial, and tourist uses are concentrated and in which the existence of degraded areas, a legacy of past dynamics, can be recognized.

3.2. El Terreno

This neighborhood was a small extramural nucleus disconnected from the city until 1932. Sponsored by the petite bourgeoisie of Palma, in the middle of the 19th century important construction activity began in the neighborhood with the aim of building residences for their enjoyment during the summer period. In 1910, El Terreno was fully constituted, and in the same year the first hotel (the Reina Victoria) was inaugurated. Although it continued to be a place of lax construction, with mostly single-family homes with gardens, in the following two decades the houses grew in height [60]. Some of them also began to be rented to foreign tourists, especially to the English. Therefore, since the mid-1920s, El Terreno ceased to be a summer home for the middle classes of Palma and became a hotel and residential zone [61].

From 1950, the tourist boom transformed and gave the current urban form to the neighborhood, since the residential function lost strength in benefit of that of tourism, and the construction of the promenade displaced the centrality of the district towards the coastal road. Finally, the increase in the value of the land meant that the old houses were replaced by apartment blocks and the first line of the promenade was flooded with high-rise buildings that contributed to the isolation of the original neighborhood [1].

Currently, the neighborhood is clearly segregated into two areas, a high zone and a low zone. Joan Miró Avenue, the main street of the neighborhood until the construction of the promenade, acts as an urban border. The high zone is characterized by steep narrow streets and combines single-family houses of the first stages of tourism (architecture of "villes") with other low quality plurifamiliar houses. The lower area, located between the promenade (Avenida Gabriel Roca) and Avenida Joan Miró, is a highly valued area. This low zone, in which many of the premises of nocturnal leisure are concentrated, is characterized by its tall buildings, creating a wall effect, specialized in the residential function or in the offer of high-quality tourism. In the middle, Joan Miró street is in deep decline. Small stores, alternative nightlife venues, and buildings with a degraded residential function characterize this central part of the neighborhood, a formerly recognized tourist center of the Mediterranean and foreseeably one of the future new gentrified areas of the city (Figure 3).

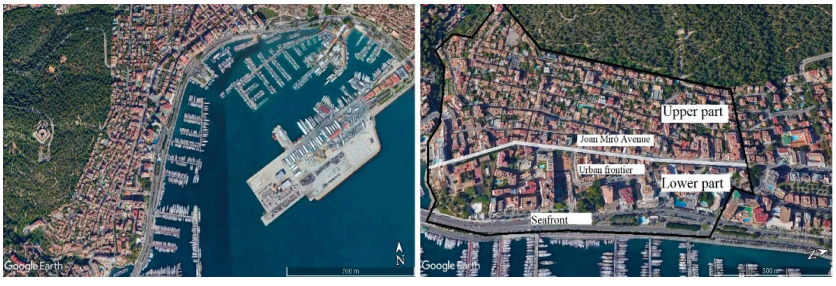


Figure 3. Aerial perspective and large urban areas of El Terreno. Source: Own elaboration from Google Earth (Lawrence, KS, USA) (2020).

4. Results: Analysis of Recent Urban-Tourist and Demographic Dynamics

4.1. Current Situation and Recent Trends of the Tourist Activity

Having presented the urban-tourist evolution of both neighborhoods in the previous section, we will now delve into the current tourist offer and the trends that have been recorded over the last five years, in accordance with the objectives of this work.

The Santa Catalina-Canteras neighborhood had 21 hotels, three hostels, and 3221 beds at the beginning of 2020, which made up a diverse offer: two five-star, four four-star, and eight three-star establishments and the remaining seven with lower categories (Table 1). The offer is also varied in relation to the size of the establishments: three of them large for an urban environment, with more than 400 rooms, four of intermediate size, and the vast majority being small hotels with less than 100 rooms.

Table 1. Touristic offer in Santa Catalina-Canteras and El Terreno. Source: Own elaboration, based on Listings of Accommodation Establishments (Tourism Boards of Mallorca and Gran Canaria).

		Santa Catalina-Canteras	El Terreno
Hotels	N°	24	5
	Beds	3221	603
Apartments	N°	17	
	Beds	1228	
Vacation rentals	N°	697	16
	Beds	2188	91

Most of these businesses were inaugurated in the 1960s and, except for a few of lower category, have been thoroughly reformed and upgraded in the last decade. In addition, there are other small and medium sized businesses that have been opened in recent years and that make up a fabric of emblematic hotels in historic buildings, collection hotels, and boutique hotels, aimed at a clientele with medium-high purchasing power. It was precisely the recent opening of new hotels and the future prospects in this regard that led the Trip Advisor portal to recognize the city as the first emerging destination in Europe in 2016 [62].

The hotel offer is completed in the neighborhood with a wide range of apartments. Seventeen apartment complexes are in operation in the Santa Catalina-Canteras neighborhood, coming to a total of 1288 beds. They are all small or medium sized complexes that began their operation in the sixties and seventies. A few of these complexes, which are the best located, have undergone processes of remodeling and maintain the unity of exploitation. In some cases, new operating companies commercialize them. Others are still oriented to a low-price segment, without obtaining income from their excellent location.

To this regulated tourist offer, we must add 2188 beds in tourist housing, a type of vacation rental recently introduced in the Canary Islands, with an even more recent regulation at the regional and municipal level. In relation to this tourist housing of the

neighborhood, three situations can be found, depending on their origin and form of exploitation. First, main homes or those that were for real estate rental that have been registered as tourist housing by their owners. Second, former apartment complexes that were residentialized between the seventies and nineties when the city's tourist decline took place. They have recently begun to be marketed under this new formula, in view of the greater business prospects by their owners, or through operating companies that have entered in this market, under contractual formulas involving the remodeling of the properties. Third, apartment complexes without a previous residentialization process change their operating model. Therefore, the current panorama brings together situations typical of the collaborative economy with others that are clearly professionalized.

In the case of El Terreno, a neighborhood considered the first tourist district of the Balearic Islands and categorized as a mature tourist enclave, it is observed that it has progressively abandoned its tourist specialization. Unlike Santa Catalina-Canteras, tourism is now secondary, with a predominance of low-quality accommodation and leisure on the promenade, although some properties have been revaluated as secondary homes.

Currently, the neighborhood has five hotels and 603 beds: one of five stars, another of three, and the rest, which are hotels and hostels of low category (Table 1). Unlike the modern and luxurious boutique hotels that are constantly increasing their offer in the historical center of Palma [63], in El Terreno all the hotels are more than 60 years old. That is, they were built during the so-called first tourist boom. The most upscale and biggest capacity hotel is located on the seafront, on the same promenade. The lower category hotels are in the degraded Joan Miró street, former epicenter of tourism in the 1950s and 1960s.

The upper part of the neighborhood concentrates 14 of the 16 ETV (tourist housing stays). The other two are in Joan Miró street. The oldest one opened in 2014. Twelve are from 2017 and the last one is from 2018. These 16 ETV offer 91 beds according to the official data offered by the Government of the Balearic Islands. However, the reality and the use of other alternative sources show a much more important offer. AIRDNA, from the homes located in the Airbnb and Vrbo platforms, accounted for 75 active rentals in the fourth quarter of 2019. This is lower than the data obtained four years earlier (fourth quarter 2016), when they totaled 123. This decrease is probably linked to the effects of tourist zoning (areas suitable for tourist marketing) because of the application of Law 6/2017 on Tourism in the Balearic Islands. In April 2018, Palma was declared a single zone. This prohibits, without exceptions, the rental of houses to tourists and, with some exceptions, is allowed in single-family homes. With these rules, Palma became the first Spanish city to take measures of this scope.

4.2. Demographic Evolution and Modification of Immigrant Stocks According to Nationality

In a city of 379,925 inhabitants in 2019, the census sections corresponding to the Santa Catalina-Canteras neighborhood showed a population figure of 21,732 inhabitants, that is, 5.7% of the municipal population, with one fifth being foreigners (21.6%).

When we compare these data with those of the population 15, 10, and five years ago (Table 2), we can see that the growth rate was very intense between 2004 and 2009 (5.93% over five years), when tourism obsolescence confirmed the trend towards a housing supply that reused the old non-hotel accommodation, at a time of great immigration attraction, linked to the years of the real estate boom in the Spanish economy.

Therefore, the growth of this neighborhood was due to the contribution of the foreign population, whose number increased by 3.9% per year in those five years. Since the crisis, the population drastically reduced its growth rate as a result of the retraction in migratory flows and, in the incipient phase of economic recovery, negative rates have been recorded, as there has been a revaluation of tourism use, a trend that is affecting especially the population of foreign origin.

Table 2. Population of Santa Catalina-Canteras. Source: Own elaboration based on the Continuous Population Register, INE (National Statistics Institute).

	Spaniards	Foreigners	Total	Annual Growth Rate for Spaniards (%)	Annual Census Growth Rate for Foreigners (%)
2004	15,951	5465	21,416		
2009	16,164	6522	22,686	1.2	3.9
2014	17,205	5682	22,887	0.2	−2.6
2019	17,033	4699	21,732	−1.0	−3.5

Regarding the composition of the foreign population and its evolution in relative terms, Figure 4 shows that the participation of foreigners from the European Community has been gaining weight, stabilizing at around 37%, and that the population from Africa has lost presence, and that the population of Asian origin has reinforced its importance, with the population of American origin remaining at around 18%.

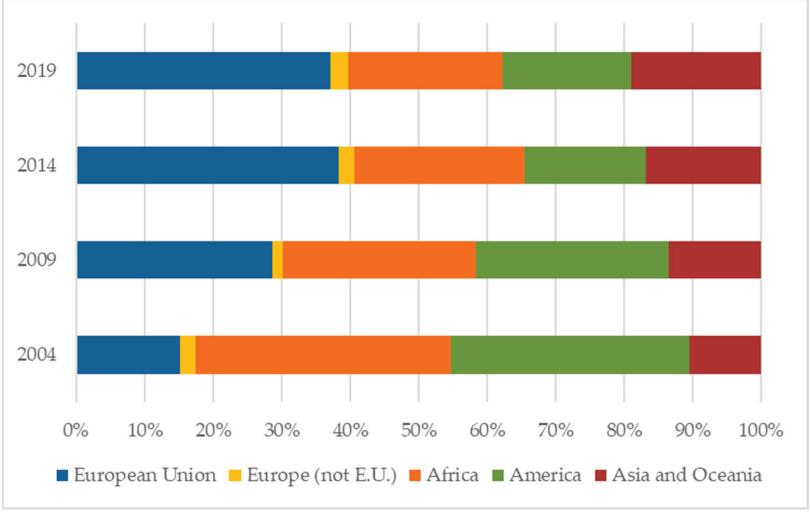


Figure 4. Evolution of the foreign population in Santa Catalina-Canteras. Source: Own elaboration based on the Continuous Population Register (National Statistics Institute).

Among the nationalities with a number above 150 people in 2019, there is a continued decrease of Moroccan, Colombian, and Cuban residents, an increasing evolution of Italians and an increase of Germans and Chinese between 2009 and 2014 and a subsequent decrease between 2014 and 2019. All of this reports a modification of the neighborhood in terms of elitization processes, due to the foreseeable correlation between nationality and income.

In the case of El Terreno, the little more than 5600 inhabitants of the neighborhood represent only 1.35% of the population of Palma. Of these, 29.5% have foreign nationality, a percentage clearly higher than that of the municipality (15.84%). However, the social-urban behavior of this small part of the city is an example of the processes of social, economic, landscape, and cultural transformation that are affecting mature tourist nuclei that, after successive stages of splendor and degradation, are reinventing themselves through gentrification.

The evolution of population in the last fifteen years in El Terreno was opposite to that in Santa Catalina Las Canteras. The urban degradation of the neighborhood in its stage of tourist obsolescence retracted the number of inhabitants, especially those of foreign nationality. This drop in the number of inhabitants from 2009 onwards in the case of

non-Spaniards can be explained mainly by the consequences of the economic crisis and the impact of unemployment on the immigrant labor population. This explains why, in just five years (2009–2014), foreigners reduced their representation by almost 27%. On the contrary, the last five years, when the effects of the crisis had been significantly mitigated in the Balearic tourist economy, the population recovered its dynamism supported by a growing arrival of foreigners. However, these were foreigners of another origin. As in the case of Santa Catalina-Canteras, we are facing a first indicator of the socio-urban transformations of the district in the postcrisis stage (Table 3).

Table 3. Population of El Terreno. Source: Own elaboration based on statistics data from the Statistical Institute of the Balearic Islands (IBESTAT).

	Spaniards	Foreigners	Total	Annual Growth Rate for Spaniards (%)	Annual Census Growth Rate for Foreigners (%)
2004	3812	2377	6189		
2009	3781	2159	5940	−0.81	−9.17
2014	3797	1577	5374	−0.42	−26.96
2019	3993	1673	5666	5.16	6.09

This trend is supported by the analysis of the evolution of the foreign population according to origin (Figure 5). As in the case of the Canary Islands, the representation of foreigners from the European Union is increasing (almost 50% of the total in 2019) and, to a lesser extent, that of Asians (mainly Chinese and Filipinos). This relative growth occurs mainly at the cost of a loss of representation of Americans. The latter have gone from almost 40% in 2004 to less than 25% in 2019.

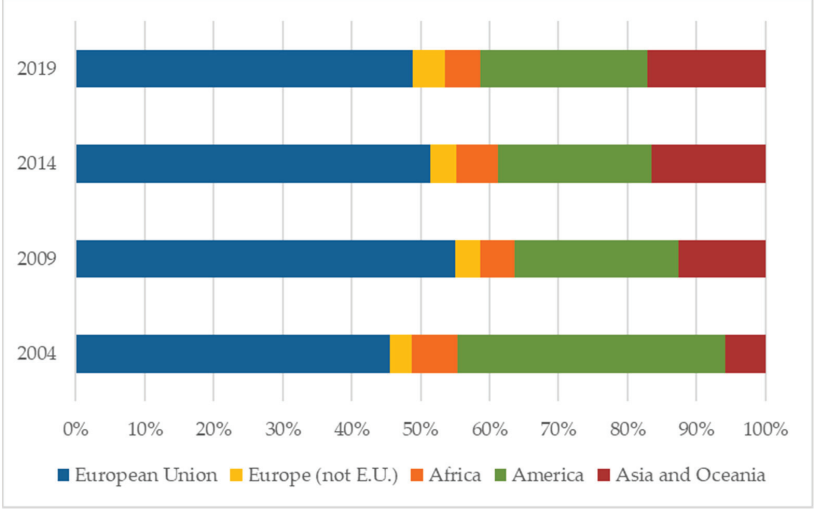


Figure 5. Evolution of the foreign population in El Terreno. Source: Own elaboration based on the Continuous Population Register, INE (National Statistics Institute).

If we take as a reference the more numerous nationalities in 2019, the evolution points to an increase of Germans, Italians, and, to a lesser extent, British and French people, and a fall of Bulgarians and Colombians. The case of Bulgarian nationals is an indicator of the social and economic changes in the neighborhoods: in only ten years, they have gone from leading the number of foreigners to occupying the fourth position and, more importantly, showing a clearly downward trend.

In short, from opposed population evolutions (increase of the population in El Terreno and decrease in Santa Catalina-Las Canteras), the two neighborhoods go in the same direction: that of elitization. A gentrification where the foreign groups of the North play a fundamental role in the two neighborhoods under study. In these, the European Community Members progressively replace the up to recently majority of labor immigrants from the South.

5. Discussion: Two Processes of International Gentrification Differentiated in the Final Phase of the Life Cycle Models

The urban, tourist, and socio-demographic transformations described, in relation to recent years, manifest two differentiated urban-tourist dynamics, but leading, in both cases, to the development of gentrification processes.

This gentrification is based on an increase in the purchase and rental prices of the homes. This is what happens in the Santa Catalina-Canteras neighborhoods. In recent times, the district registered a continuous drop in purchase and sale prices from the beginning of the economic crisis in 2008 to the summer of 2014. As of the first quarter of 2016, a price escalation was set in motion, culminating in September 2019, when the highest average value per square meter was reached in the neighborhoods, that of 3104 Euros, well above the average value in the city, according to the real estate portal Idealista.com. This trend also occurred in the city as a whole, but the recent increase in prices was much more moderate (Figure 6).

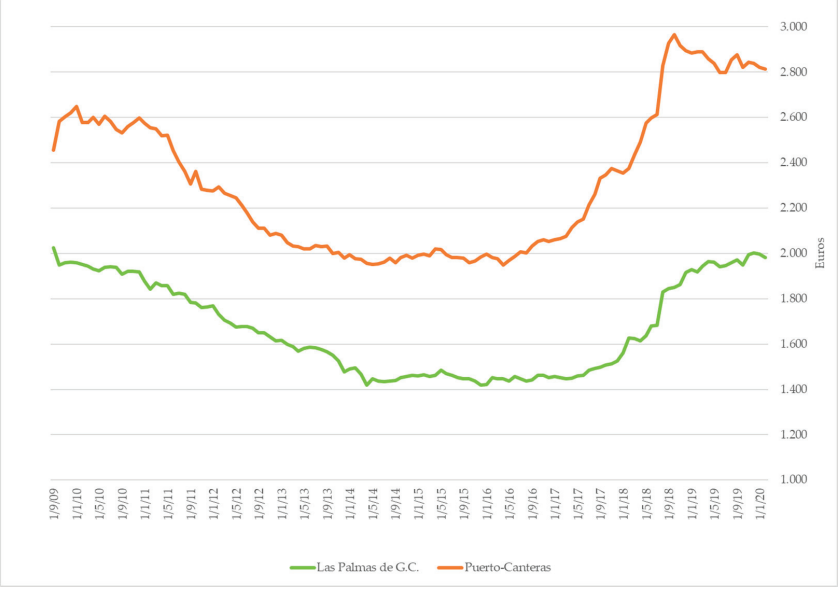


Figure 6. Average price per m^2 in Euros of sales (2009–2019) in Las Palmas de Gran Canaria and Santa Catalina-Canteras. Source: Own elaboration from El Idealista.

These same trends can be seen in the evolution of rentals. The neighborhoods registered the most expensive average rent per m^2 in the city, having reached their maximum value in 2018 (13.06 Euros). In 2018, the Paseo de Las Canteras, the waterfront avenue of Santa Catalina-Canteras, was the fifth most expensive average rental street in Spain, according to Tecnitasa [64].

The above trends are explained by several reasons. Firstly, the importance of the productive restructuring of the tourism sector, since it promotes the purchase of real

estate for tourist rentals and new hotel products. Secondly, the purchase of real estate by international demand for vacation and productive purposes. The data of the Association of Registrars support this for the whole of the Canary Islands. In 2018, more than 31% of the purchase and sale operations in the islands were carried out by foreigners, especially the British, Germans, the French, Belgians, and Swedes. Finally, the early revaluation of investments and the environmental quality of the surroundings of Las Canteras beach has meant that local demand has grown in a large part of the area, although possibly more oriented towards business than for residential purposes.

The increase in real estate prices has its correlation in the increase of income levels of the resident population in the Santa Catalina-Canteras neighborhoods. Indeed, taking as a reference the data of the postal district of La Isleta-Puerto-Guanarteme, which coincides in statistics terms with the studied zone, the gross average income changed from 29,370 Euros, in 2013, to 31,261 Euros, in 2017 (Statistics of the Declarants of the Income Tax of the Physical Persons). This increase in income may be due in part to an improvement in the economic conditions of the resident population, but if we consider the evolution of income in other districts that have not had such a significant real estate expansion in the city, we can conclude that the growth in income is related to the construction of new homes and the increase in rents and sales prices.

However, the increases in income are more moderate than those recorded in real estate sales and rental prices. This informs us that tourism activity and international demand, which is not directly reflected in income values, are what sustain the prices of real estate in the neighborhoods and not so much the arrival of local people with more purchasing power to occupy the new properties or to replace residents with lower incomes. In other words, the 'expulsion' of residents who cannot pay their rents or who find it advantageous to sell or put their property up for tourist rental must be placed within the framework of a process of tourist gentrification that is fundamentally given by the development of rental for tourist use and international residential tourism.

In El Terreno, the real estate market was also very dynamic at the beginning of 2020. The number of houses for sale was important in all census sections, exceeding 200 in those located in the central (around Joan Miró street) and lower (promenade) parts of the neighborhoods. In all the sections, the sale prices were high, but in the part coinciding with the maritime façade, the highest sales means were registered. These two sections also led the rental offer of Section 07-040-02-007, bordering the heavily gentrified neighborhoods of Santa Catalina and Espanyolet, and had the highest prices, while Section 07-040-02-010 showed the lowest values. This area corresponds to the highest part of the city, in contact with Parc de Bellver and where the building model combines traditional single-family housing with low quality multi-family blocks (Table 4).

Table 4. Housing for sale and residential rent by census tract in El Terreno (13-03-2020). Source: Own elaboration from El Idealista.

Census Tract	Total Houses Sold	Total Rental Housing	Average Sales Price (€/m^2)	Average Rental Price (€/m^2)
07-040-02-007	121	24	4397	14.60
07-040-02-008	244	82	4266	12.67
07-040-02-009	229	59	4029	11.91
07-040-02-010	152	16	3744	11.77
El Terreno	746	181	4015	12.69
Palma	8036	1537	3784	13.44

Although El Terreno does not constitute a single zip code but is integrated into a larger territory (zip code 07014, son Dureta), the evolution of income provides us with some clues to the socio-urban transformations of the neighborhoods. The average gross income in 2017, the last data available, is among the highest in Palma, exceeding the municipal average by almost 17,000 Euros. Simultaneously, the differences between zip codes are

increasing, a symptom of the growing urban inequalities in this post-crisis stage. Between 2013 and 2017, the municipal average increased by about 4000 euros, while it did so by 11,000 euros in our study area. In Palma, the year-on-year percentage growth has been around 4% since 2014, and in Son Dureta it reached over 14% in 2016–2017 (Table 5).

Table 5. Evolution of average gross income indicators 2013–2017. Postal code 07014—Son Dureta. Source: Own elaboration based on statistics of personal income tax filers in the largest municipalities by zip code, Tax Office.

	2013	2014	2015	2016	2017
Son Dureta	36,007	37,534	38,127	41,251	47,300
Palma	26,452	26,841	27,994	28,973	30,343
	-	2013–2014	2014–2015	2015–2016	2016–2017
Son Dureta	-	4.24%	1.58%	8.19%	14.66%
Palma	-	1.47%	4.30%	3.50%	4.73%

This spectacular increase in income, in a dynamic real estate market, shows that demographic contingents with greater purchasing power have chosen the neighborhood as their place of residence. If we bear in mind that in recent years, especially the population of community origin has grown, we can say that El Terreno is increasingly integrated into the international residential real estate market and that, consequently, a process of gentrification is taking place in which the new European Community inhabitants, especially Germans, Italians, the British, and the French, are gaining weight to the detriment of the population that had resided there until then, that is, the Spanish and foreigners of other nationalities.

Therefore, faced with the uncertain future of tourism in the neighborhood, an influential real estate sector is consolidating and producing a growing residentialization linked to a high-income level population, in many cases of European Community origin. The numerous offers of housing for rent and, above all, for sale, the high prices reached and the constantly increasing average income levels, are at the base of these processes.

In correspondence with a post-Fordist regime, of global capitalism and the model of flexible and digital accumulation [65], El Terreno and Santa Catalina-Canteras have evolved towards a new system of production and consumption of real estate and tourism, experiencing great transformations as a response to the global economic crisis of 2008 and as a strategy to adapt to new models of regulation. The system of production and consumption has in common, for both cases, its dependence on demand and international investment, but they follow different paths.

In El Terreno, the transformation is oriented towards residentialization, so from the point of view of the tourist life cycle model, it implies deepening its decline from its position as a mature destination, because of the restrictions on vacation housing imposed in the city of Palma (Law 6/2017 on Tourism in the Balearic Islands) and of the appearance of new real estate agents. These are listed real estate investment companies or investment "vulture" funds, which have only favored the international real estate market.

In Santa Catalina-Canteras, in Las Palmas de Gran Canaria, the transformation involves a commitment to the Peer-to-Peer Collaborative Economy, to residential or second home tourism and to new forms of coastal tourism. From the life cycle model, the neighborhood rejuvenates, but with the predominance of tourist and real estate accommodation far from the traditional tourist formulas.

In both cases, in these final stages of the life cycle model as tourist destinations, gentrification processes occur, which is also related to the revaluation phase in the life cycle model of the neighborhoods. In both cases, after a stage of ethnicization and loss of real estate value ("filtering"), increases in real estate value and social substitution are registered. Again, the internationalization of tourism and real estate activities are at the base of these processes, but in the case of Santa Catalina-Canteras, we are facing a process of tourism gentrification. In this regard, the gentrifying capacity of tourism has been

analyzed as the result of the increase of the tourist function within the residential urban space [2,33], considering that the tourism increase might occur under traditional forms of exploitation or through new modalities in the digital economy framework. This new context is removing from the offer many of the properties that were intended for permanent residential use, and this, in turn, implies processes of displacement and social elitization in the urban destinations.

6. Conclusions

The study of urban transformations and social changes linked to tourism cycles gains greater importance when faced from a comparative perspective. The neighborhoods of El Terreno in Palma (Mallorca) and Santa Catalina-Canteras in Las Palmas de Gran Canaria (Gran Canaria), located in the two most populous cities of their respective archipelagos, had a similar urban-tourist development until the end of the 20th century. They are neighborhoods that originally housed summer homes for owners of their respective cities and later became a hotel and residential area that accommodated foreign tourists, a specialization that increased from the 1950s until the 1980s, when their maturity as tourist neighborhoods was affected by a certain obsolescence.

Over the years, both spaces have maintained a complementary relationship with the rest of the urban neighborhoods, given that they have not only been places of leisure for visitors and tourists, but also for the enjoyment of the local population, as well as a place of permanent residence for a considerable number of residents. In the case of Santa Catalina-Canteras, the renovation actions undertaken since then have increased the residentialization of the neighborhood, giving it a certain tourist–residential hybridity. However, in El Terreno, there was a certain differentiation of uses between a higher and more distant area from the coast of a residential nature, more degraded, and the coastal area, with a residential and tourist function, both of higher quality.

During the first three lustrums of this century, both in Santa Catalina-Canteras and in El Terreno (especially in its upper area), the most deteriorated properties that had been withdrawn from the tourist accommodation offer were put on the rental market, with many workers with scarce resources agreeing to rent them, mostly labor immigrants from non-EU countries. Therefore, these neighborhoods have contributed to the development of the consolidated city, both from an urban, housing, and economic point of view. However, they have been integrated into it with a particular idiosyncrasy, as tourists, labor immigrants, lifestyle immigrants, and residents of different origins have shared the leisure space represented by its beaches and surroundings and have participated in the dynamism of its tourist and tourist–residential economy.

Since 2014, the demographic and economic dynamics of the two neighborhoods in this study have diverged. In the first case, Santa Catalina-Canteras, the revaluation of the neighborhood for tourist use has caused a demographic loss, while in the second, El Terreno, its residential strength has been recovered, attracting foreigners with high purchasing power. At the same time, in Santa Catalina-Canteras, the revaluation of tourism has meant an increase in rents and purchase prices and, indirectly, has increased the income levels of the population. Thus, the process of gentrification has led to neighborhood protests, who consider that the investment in the refurbishment of properties for rent as holiday homes is contributing to the expulsion of residents, a type of reaction that has not occurred in the rest of the city's neighborhoods.

In the case of El Terreno, an influential real estate sector has been consolidated, as well as a residential sector linked to a high economic level population, which has meant that the average gross income of this urban sector is among the highest in Palma. Unlike other neighborhoods in the capital of Mallorca, the first gentrification dynamics have not, for the moment, produced a high level of neighborhood protest. They are probably not yet very visible to the public, but they are irreversible. The gentrification in El Terreno is part of an expansive wave that first affected the historic center and later the neighboring districts of

Santa Catalina and Espanyolet. It is a process that, like an oil stain, has been spreading to potentially profitable areas of the city for real estate investment.

In short, the two mature tourist districts, in the island cities of Palma and Las Palmas de Gran Canaria, offer divergent trajectories in this phase of late capitalism. In both, we witness a certain social elitization in a context of revaluation, after a phase of loss of value, according to the model of life cycle of the neighborhoods, but in Santa Catalina-Canteras, this occurs in a context of tourist rejuvenation and in El Terreno, of decline, according to the model of life cycle of the destinations. In conclusion, the productive reorganization, and the search for new capital gains result in a process of gentrification, either predominantly tourist, in the case of Santa Catalina-Canteras, or residential, in the case of El Terreno, conditioning their functional specialization and promoting social inequality.

At the time of writing, it is difficult to predict what the future trends will be in these urban-tourist areas, as the pandemic has considerably reduced the flow of tourists and labor migrants, contracted investment in tourist rehabilitation, and led to a decrease in real estate transactions and a fall in house prices. However, it is likely that the hybrid character of these areas will favor an earlier recovery than that which will characterize other tourist enclaves on the coast, outside the big cities.

Author Contributions: Conceptualization, methodology, investigation, resources, writing, and review and editing: J.D.-M., J.M.P.-C., J.M.G.-P. and D.S.-A. All authors have read and agreed to the published version of the manuscript.

Funding: This research was funded by the projects: "Housing and international mobility in cities of the Canary Islands. The emergence of new forms of urban inequality" (RTI2018-093296-B-C21) and "Housing and International Mobility in the Cities of the Balearic Islands. The Emergence of New Forms of Urban Inequality" (RTI2018-093296-B-C22), financed by the European Regional Development Fund (ERDF)/Ministerio de Ciencia, Innovación y Universidades—Agencia Estatal de Investigación (AEI) (Ministry of Science, Innovation and Universities—State Research Agency (AEI).

Institutional Review Board Statement: The study did not require ethical approval.

Informed Consent Statement: Not applicable.

Data Availability Statement: Raw data are publicly available.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. Domínguez-Mujica, J.; González-Pérez, J.M.; Parreño-Castellano, J.M. Transformaciones recientes en barrios turísticos maduros. Los casos de Palma de Mallorca y Las Palmas de Gran Canaria, España. *Scr. Nova* **2008**, *XII*, 270.
2. Lee, D. How Airbnb short-term rentals exacerbate Los Angeles's affordable housing crisis: Analysis and policy recommendations. *Harv. Law Policy Rev.* **2016**, *10*, 229–253.
3. Lees, L.; Shin, H.B.; López-Morales, E. *Planetary Gentrification*; John Wiley & Sons: Cambridge, UK, 2016.
4. Smith, N. Toward a theory of gentrification. A back to the city movement by capital, not people. *J. Am. Plan. Assoc.* **1979**, *45*, 538–548.
5. Yetiskul, E.; Demirel, S. Assembling gentrification in Istanbul: The Cihangir neighbourhood of Beyoğlu. *Urban Stud.* **2018**, *55*, 3336–3352. [CrossRef]
6. Domínguez-Mujica, J.; Parreño-Castellano, J.M.; Moreno-Medina, C. Vacation Rentals, Tourism and International Migrations: Gentrification in Las Palmas de Gran Canaria (Spain) from a diachronic perspective. In *Handbook of Research on the Impacts, Challenges, and Policy Responses to Overtourism*; Ribeiro de Almeida, C., Quintano, A., Simancas, M., Huete, R., Breda, Z., Eds.; IGU Global: Hershey, PA, USA, 2019; pp. 237–260. [CrossRef]
7. Maitland, R.; Newman, P. Developing world tourism cities. In *World Tourism Cities. Developing Tourism off the Beaten Track*; Maitland, R., Newman, P., Eds.; Routledge: Oxon, UK, 2014; pp. 15–35.
8. Butler, R.W. The concept of a tourist area cycle of evolution: Implications for management of resources. *Can. Geogr.* **1980**, *24*, 5–12. [CrossRef]
9. Gormsen, E. The spatio-temporal development of international tourism: Attempt at a centre-periphery model. *Etudes Mem.* **1981**, *55*, 150–169.
10. Gormsen, E. The impact of tourism on coastal areas. *Geo J.* **1997**, *42*, 39–54.
11. Hall, C.M. Space–time accessibility and the TALC. In *The Tourism Area Life Cycle*; Butler, R.W., Ed.; Channel View Publications: Bristol, UK, 2006; Volume 2, pp. 83–100.

12. Singh, S. The tourism area 'life cycle': A clarification. *Ann. Tour. Res.* **2011**, *38*, 1185–1187. [CrossRef]
13. Wall, G. Cycles and capacity: A contradiction in terms? *Ann. Tour. Res.* **1983**, *10*, 268–269. [CrossRef]
14. Haywood, K.M. Can the tourist area life-cycle be made operational? *Tour. Manag.* **1986**, *7*, 154–167. [CrossRef]
15. Franklin, A.; Crang, M. The trouble with tourism and travel theory? *Tour. Stud.* **2001**, *1*, 5–22. [CrossRef]
16. Butler, R.W. (Ed.) *The Tourism Life Cycle*; Applications and Modifications; Channel View Publications: Clevedon, UK, 2006; Volume 1.
17. Hall, C.M.; Page, S.J. Progress in Tourism Management: From the geography of tourism to geographies of tourism—A review. *Tour. Manag.* **2008**, *1*, 3–16. [CrossRef]
18. Oppermann, M.; Agarwal, S. What is new with the resort cycle? *Tour. Manag.* **1998**, *19*, 179–180. [CrossRef]
19. González Pérez, J.M. Un plan nuevo para un núcleo turístico maduro. Reconversión y rehabilitación de la Platja de Palma (Mallorca). In *Renovación y Reestructuración de destinos Turísticos en Áreas Costeras. Marco de Análisis, Procesos, Instrumentos y Realidades*; Vera Rebollo, J.F., Sánchez, I.R., Eds.; Publicacions de la Universitat de València: Valencia, Spain, 2012; pp. 243–268.
20. Butler, R.W. *The Tourism Life Cycle: Conceptual and Theoretical Issues*; Channel View Publications: Clevedon, UK, 2006; Volume 2.
21. Butler, R.W. *Contemporary Tourism Reviews*; Goodfellow Publishers Limited: Woodeaton, Oxford, UK, 2011.
22. Butler, R.W. Overtourism, education, and the tourism area life cycle model. In *Overtourism and Tourism Education: A Strategy for Sustainable Tourism Futures*; Séraphin, H., Yallop, A., Eds.; Routledge: Oxon, UK, 2020; pp. 7–23.
23. Báez-García, A.J.; Flores-Muñoz, F.; Gutiérrez-Barroso, J. Maturity in competing tourism destinations: The case of Tenerife. *Tour. Rev.* **2018**, *73*, 359–373. [CrossRef]
24. Albaladejo, I.P.; Martínez-García, M.P. The poststagnation stage for mature tourism areas: A mathematical modeling process. *Tour. Econ.* **2017**, *23*, 387–402. [CrossRef]
25. Butler, R.W. Tourism in the future: Cycles, waves or wheels? *Futures* **2009**, *41*, 346–352. [CrossRef]
26. Strapp, J.D. The resort cycle and second homes. *Ann. Tour. Res.* **1988**, *15*, 504–516. [CrossRef]
27. Baum, T. Taking the Exit Route: Extending the Tourism Area Life Cycle Model. *Curr. Issues Tour.* **1998**, *1*, 167–175. [CrossRef]
28. Benner, M. The Decline of Tourist Destinations: An Evolutionary Perspective on Overtourism. *Sustainability* **2020**, *12*, 3653. [CrossRef]
29. Knowles, T.; Curtis, S. The Market Viability of European Mass Tourist Destinations. A Post-stagnation life cycle analysis. *Int. J. Tour. Res.* **1999**, *1*, 87–96.
30. Vera, F.; Rodríguez, I. Presentación. In *Renovación y Reestructuración de Destinos Turísticos en Áreas Costeras. Marco de Análisis, Procesos, Instrumentos y Realidades*; Vera Rebollo, J.F., Sánchez, I.R., Eds.; Publicacions de la Universitat de València: Valencia, Spain, 2012; pp. 13–16.
31. Gotham, K.F. Assessing and Advancing Research on Tourism Gentrification. *Via. Tour. Rev.* 2018. Available online: http://journals.openedition.org/viatourism/2169 (accessed on 16 March 2021). [CrossRef]
32. Gotham, K.F. Tourism Gentrification: The Case of New Orleans's Vieux Carre (French Quarter). *Urban Stud.* **2005**, *42*, 1099–1121. [CrossRef]
33. Füller, H.; Michel, B. 'Stop being a tourist!'New dynamics of urban tourism in Berlin-Kreuzberg. *Int. J. Urban Reg. Res.* **2014**, *38*, 1304–1318. [CrossRef]
34. Minoia, P. Venice Reshaped? Tourist Gentrification and Sense of Place. In *Tourism in the City: Towards an Integrative Agenda on Urban Tourism*; Bellini, N., Pasquinelli, C., Eds.; Springer: Berlin/Heidelberg, Germany. [CrossRef]
35. Gibson, C.; Connell, J. Music, Tourism and the Transformation of Memphis. *Tour. Geogr.* **2007**, *9*, 160–190. [CrossRef]
36. Yip, N.M.; Tran, H.A. Is 'Gentrification' an Analytically Useful Concept for Vietnam? A Case Study of Hanoi. *Urban Stud.* **2016**, *53*, 490–505. [CrossRef]
37. Liang, Z.-X.; Bao, J.-G. Tourism gentrification in Shenzhen, China: Causes and socio-spatial consequences. *Tour. Geogr.* **2015**, *17*, 461–481.
38. Janoschka, M.; Sequera, J.; Salinas, L. Gentrification in Spain and Latin America—A critical dialogue. *Int. J. Urban Reg. Res.* **2014**, *38*, 1234–1265. [CrossRef]
39. Jover, J.; Díaz Parra, I. Gentrification, transnational gentrification and touristification in Seville, Spain. *Urban Stud.* **2020**, *57*, 3044–3059. [CrossRef]
40. Cócola-Gant, A. Holiday Rentals: The New Gentrification Battlefront. *Sociol. Res. Online* **2016**, *21*, 112–120. [CrossRef]
41. Hiernaux, D.; González, I. Turismo y gentrificación: Pistas teóricas sobre una articulación. *Rev. De Geogr. Norte Gd.* **2014**, *58*, 55–70. [CrossRef]
42. Cocola-Gant, A. Tourism gentrification. In *Handbook of Gentrification Studies*; Lees, L., Phillips, M., Eds.; Edward Elgar Publishing: Cheltenham/Northampton, UK, 2018.
43. Colomb, C.; Novy, J. Urban tourism and its discontents: An introduction. In *Protest and Resistance in the Tourist City*; Colomb, C., Novy, J., Eds.; Routledge: London, UK, 2016; pp. 1–30.
44. Gusman, I.; Chamusca, P.; Fernandes, J.; Pinto, J. Culture and Tourism in Porto City Centre: Conflicts and (Im) Possible Solutions. *Sustainability* **2019**, *11*, 5701. [CrossRef]
45. Gravari-Barbas, M.; Guinand, S. Introduction. Addressing tourism-gentrification processes in contemporary Metropolises. In *Tourism and Gentrification in Contemporary Metropolises. International Perspectives*; Gravari-Barbas, M., Guinand, S., Eds.; Routledge: London, UK, 2019. [CrossRef]

46. Domínguez-Mujica, J.; González-Pérez, J.M.; Parreño-Castellano, J.M. Tourism and human mobility in Spanish Archipelagos. *Ann. Tour. Res.* **2011**, *38*, 586–606. [CrossRef]
47. Edensor, T. Entangled agencies, material networks and repair in a building assemblage: The mutable stone of St Ann's Church, Manchester. *Trans. Inst. Br. Geogr.* **2011**, *36*, 238–252. [CrossRef]
48. Chapman, A.; Light, D. Exploring the tourist destination as a mosaic: The alternative lifecycles of the seaside amusement arcade sector in Britain. *Tour. Manag.* **2016**, *52*, 254–263. [CrossRef]
49. McKercher, B.; Wong, I.A. Do destinations have multiple lifecycles? *Tour. Manag.* **2021**, *83*, 104232. [CrossRef]
50. Nilsson, J.H. Conceptualizing and contextualizing overtourism: The dynamics of accelerating urban tourism. *Int. J. Tour. Cities* **2020**, *6*, 657–671. [CrossRef]
51. Spanish Statistics Institute (INE). Continuous Register Statistics (varios años). Available online: https://www.ine.es/dyngs/INEbase/es/operacion.htm?c=Estadistica_C&cid=1254736177012&menu=resultados&idp=1254734710990#!tabs-1254736195461 (accessed on 16 March 2021).
52. Spanish Tax Agency. Estadística de los Declarantes del Impuesto Sobre la Renta de las Personas Físicas de los Mayores Municipios por Código Postal (varios años). Available online: https://www.agenciatributaria.es/AEAT.internet/datosabiertos/catalogo/hacienda/Estadistica_del_IRPF_por_codigo_postal.shtml (accessed on 16 March 2021).
53. Gran Canaria Tourism Board. Oferta Alojativa de Gran Canaria. Available online: https://www.grancanaria.com/turismo/es/area-profesional/tramites/listados-de-establecimientos/ (accessed on 16 March 2021).
54. Idealista.com. Evolución del Precio de la Vivienda en Venta en España (varios años). Available online: https://www.idealista.com/sala-de-prensa/informes-precio-vivienda/ (accessed on 16 March 2021).
55. Eurotransmer. Cinco Puertos Mueven Cerca del 90% del Tráfico de Contenedores en España. Available online: https://www.aeutransmer.com/2019/05/20/cinco-puertos-mueven-cerca-del-90-del-trafico-de-contenedores-en-espana/ (accessed on 1 November 2020).
56. Solbes Ferri, S. La necesaria construcción de un puerto marítimo para Las Palmas de Gran Canaria como complemento a los decretos de puertos francos (1852–1883). In *XV Coloquio de Historia Canario-Americana*; Cabildo de Gran Canaria: Las Palmas de Gran Canaria, Spain, 2004; pp. 211–251.
57. CIES. *Introducción a un Estudio Socioeconómico del Turismo en la Provincia de Las Palmas*; CIES (Centro de Investigación Económico y Social): Las Palmas de Gran Canaria, Spain, 1974.
58. Hernández Luís, J.A.; Parreño Castellano, J.M. *Evolución e Implicaciones del Turismo en Maspalomas Costa Canaria*; Ayuntamiento de San Bartolome de Tirajana: Las Palmas de Gran Canaria, Spain, 2001.
59. Parreño Castellano, J.M.; Hernández Calvento, L. Maspalomas Costa Canaria: El difícil equilibrio entre el desarrollo turístico y la conservación del litoral. In *Geografía Urbanas de Gran Canaria y Fuerteventura*; Parreño Castellano, E.J.M., Moreno Medina, C.J., Eds.; Mercurio Editorial: Madrid, Spain, 2020; pp. 75–87.
60. Barceló, B. El Terreno. Geografía urbana de un barrio de Palma. *Boletín Cámara Of. Comer. Ind. Naveg. Palma Mallorca* **1963**, *LXV*, 127–178.
61. Seguí, M. *La Arquitectura del ocio en Baleares. La Incidencia del Turismo en la Arquitectura y el Urbanismo*; Lleonard Muntaner: Palma, Spain, 2001.
62. Trip Advisor. Las Palmas de Gran Canaria, Primer Destino Emergente de Europa Para Trip Advisor. Available online: https://lpavisit.com/es/noticias/ciudad/149-lpa-capital-city/2022-las-palmas-de-gran-canaria-primer-destino-emergente-de-europa-para-trip-advisor (accessed on 16 March 2021).
63. González Pérez, J.M. The dispute over tourist cities. Tourism gentrification in the historic Centre of Palma (Majorca, Spain). *Tour. Geogr.* **2020**, *22*, 171–191. [CrossRef]
64. Tecnitasa. Verano 2018. Informe Alquiler en la Costa. Available online: https://www.tecnitasa.es/precio-de-alquiler-informe-maximos-y-minimos-enero19/ (accessed on 16 March 2021).
65. Garay, L.; Cánoves, G. Life cycles, stages and tourism history: The Catalonia (Spain) experience. *Ann. Tour. Res.* **2011**, *38*, 651–671. [CrossRef]

urban science

MDPI

Article

Home Dispossession and Commercial Real Estate Dispossession in Tourist Conurbations. Analyzing the Reconfiguration of Displacement Dynamics in Los Cristianos/Las Américas (Tenerife)

Dennis Hof

Department of Geography, University of Leipzig, 04103 Leipzig, Germany; dennis.hof@uni-leipzig.de

Abstract: Since the onset of the global financial crisis, urban dwellers face an increasing number of obstacles in establishing themselves on the housing market. Against this backdrop, this paper addresses the variegated dynamics of real estate dispossession in the tourist conurbation Los Cristianos/Las Américas on an intra-urban scale. First, I will present the spatio-temporal patterns of dispossession for the period 2001–2015 using the ATLANTE database (CGPJ). Specifically, I analyze mortgage foreclosures and tenant evictions, both for residential and commercial spaces. Second, I delve deeper into local experiences of dispossession of the resident population and their housing and income conditions by means of questionnaires that I conducted in 2018. The data shows that mortgage foreclosures and dispossessions of residential spaces predominate the initial years after the crisis, albeit with varied spatial incidence. However, the increase in tenant evictions from 2014 onwards points to a reconfiguration of displacement dynamics. Indeed, as stated by the interviewees, staggeringly high rent burdens have become the main driver for displacement from both living and working spaces in recent years. Given the ongoing global pandemic, further and more nuanced research is necessary to grasp how these prevailing housing insecurities are shaped during and beyond the coronavirus crisis.

Keywords: real estate dispossession; mortgage foreclosure; evictions; short-term rentals; financialization; housing studies; critical geography; Canary Islands

Citation: Hof, D. Home Dispossession and Commercial Real Estate Dispossession in Tourist Conurbations. Analyzing the Reconfiguration of Displacement Dynamics in Los Cristianos/Las Américas (Tenerife). *Urban Sci.* **2021**, *5*, 30. https://doi.org/10.3390/urbansci5010030

Received: 18 January 2021
Accepted: 4 March 2021
Published: 9 March 2021

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Copyright: © 2021 by the author. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Introduction

More than a decade since the outbreak of the global financial crisis (GFC), financial insecurity and precarious working conditions continue to shape the quotidian life of many urban dwellers in Spain [1,2]. This is closely linked with the speculative accumulation tendencies of a crisis-prone real estate sector. In recent years, this comprises most notably the rental sector, provoking new dynamics of displacement and dispossession. In addition to the metropolises, these dynamics once again resonate particularly in the insular and Mediterranean tourist regions [3,4].

Starting in the 1960s, the Franco dictatorship certainly paved the way for large-scale real estate-based capital accumulation in Spain, promoting both homeownership and tourism development [5,6]. After the transition, Spain continued to rely on high construction volume and rising real estate prices to foster economic growth: with the country's entry into the European community 1986, foreign investment into the tourism sector further accelerated the Spanish real estate boom [7,8]. At the same time, private household debt rose substantially, given the loose legal regulation of mortgage lending and the prevalence of predatory lending practices and sub-prime mortgages among low-income groups [9]. Following the onset of the GFC and the bursting of the real estate bubble in 2008, construction activity came to a grinding halt, unemployment figures reached record levels, and until 2014, over 570,000 households lost their homes due to mortgage default [1] (p. 322).

On a regional level, this affected mainly the Mediterranean region, as well as the Canary Islands and Balearic Islands, i.e., the hotspots of capital accumulation during the boom years [10–12] (see also Figure 1).

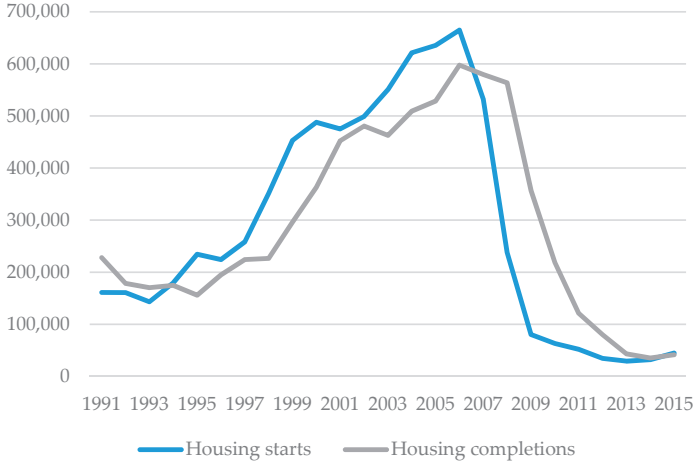


Figure 1. Construction activity in Spain (1991–2015). Housing starts and housing completions. Ministerio de Transporte, Movilidad y Agenda Urbana. Own elaboration.

In the aftermath of the crisis, the government-owned clearing bank SAREB (*Sociedad de Gestión de Activos procedentes de la Reestructuración Bancaria*) was responsible for managing and restructuring the plethora of foreclosed properties. In practice, restructuring often involved the large-scale sale of those properties to private-equity firms like Blackstone or Cerberus at discount rates. These global institutional actors then became new players on local real estate markets, inflating the rental sector in form of real estate investment trusts (REITs or SOCIMIs). Coupled with the emergence of very profitable short-term rentals in tourist regions due to disruptive platform providers like Airbnb, this exerted notable pressure upon the remaining affordable long-term rentals. As a result, low-income tenants and shopkeepers struggled to access the rental market. Ironically, after having defaulted on their mortgages or lost their jobs during the crisis, they now depend more than ever on affordable housing in the rental sector. In recent years, though, the number of evictions due to non-payment of rent increased substantially. Despite apparent economic recovery, thus, the pre-pandemic years already pointed towards a new housing crisis, which yet again was politically orchestrated [4,13,14].

Building on these interlinkages, over the last decade, critical scholars have established an extensive field of research regarding the geographies of housing dispossession in Spain. The first studies approached the issue from an interregional scale, analyzing the socio-spatial distribution of mortgage foreclosures and the reasons for the bursting of the Spanish real estate bubble on the basis of the judicial districts [15,16]. The following studies, however, gradually applied the intra-urban scale as a central field of analysis of urban inequalities. Noteworthy in this context are case studies from Catalonia, the Balearic Islands, the Canary Islands, Madrid, and Valencia. While breaking down the intra-urban distribution of dispossessed homes, these studies also analyze the new ownership structures of the previously foreclosed assets and consider the socio-economic contexts of the affected neighborhoods [3,4,13,17–21]. With all these advances being made, difficulties still remain in accessing data on an inframunicipal level. One reason for this is that the existing data of the General Council of the Judiciary (CGPJ) is often defective in terms of providing a comprehensive overview of real estate dispossession. For one part, it does not list commercial and residential real estate separately each. For another part, it lists only

court-ordered foreclosures and evictions. In this sense, the CGPJ only depicts the "tip of the iceberg", as displacement most often involves (semi)voluntary abandonment of the property or cost-neutral out-of-court settlements—in other words, processes, dynamics, and events that researchers struggle to capture [4] (p. 6). Finally, official judicial sources do not give details on the number of members in a household, i.e., with this data it is impossible to know how many people are affected by dispossession (see Parreño Castellano et al. 2019 for a more profound discussion on the limits and merits of CGPJ data) [22].

Following these studies, this paper analyzes mortgage foreclosures and tenant evictions on the intra-urban level of Los Cristianos-Las Américas (LC-LA), a tourist conurbation prominently situated in the south of Tenerife. The overall aim of this paper is to shed light on socio-spatial housing inequalities by (i) exposing how dispossession of residential and working spaces unfolds both temporarily and spatially and (ii) inquiring about the significance of dispossession and displacement in the lives of residents and working people alike. Moreover, I seek to answer to which extent the observed experiences of dispossession resonate with regional and national trends. This also implies exploration of how real estate speculation has shifted towards the rental sector and how this concerns the local population. As mentioned before, several case studies already have dealt with real estate dispossession on the Canary Islands. However, with exception of case studies from the island capitals Las Palmas de Gran Canaria and Santa Cruz de Tenerife, scholars so far have only approached the phenomenon on a regional scale [4,17,23–25]. As these works already hinted at a particular impact on tourist destinations, the case of LC-LA serves as a relevant research area to trace the reconfiguration of dispossession and displacement dynamics on an intra-urban scale. Besides, the municipalities surrounding LC-LA up until the onset of the pandemic comprised the lion's share of Tenerife's short-term rentals, making it all the more worthwhile as a research area. In the context of my research, the underlying database ATLANTE (CGPJ) provides a differentiated consideration of residential and commercial real estate dispossession for the period 2001–2015, thus allowing me to draw conclusions regarding the concernment of working spaces. Looking beyond the mere court-ordered dispossessions, the paper then carries out a supplementary evaluation of questionnaires conducted 2018 in situ. The questionnaires give insights into the experiences of dispossession and their respective socio-economic contexts.

The paper is structured as follows. The next chapter develops the theoretical lens of my investigation, venturing to sketch a rudimentary synthesis of the main insights of critical housing studies regarding dispossession and financialization. Herein, it sketches out emerging trends related to the coronavirus disease 2019 (COVID-19) pandemic, albeit, of course, in a preliminary manner only. The following chapter specifies the empirical data and the methodical procedure, which involves both database analysis and questionnaire evaluation. As a manner of contextual introduction into the research area, the paper then outlines the investment-driven genesis of the tourist settlements in the south of Tenerife. The ensuing main chapter seeks to (i) present the temporalities and spatialities of intra-urban real estate dispossession before (ii) coupling them with the experiences of residents and shopkeepers alike. To conclude, results will be discussed in line with the theoretical and regional lenses. The paper then closes by outlining recommendations for future critical research, also against the backdrop of both (yet lacking) insurgent practices and the ongoing pandemic.

2. Housing Financialization and Real Estate Dispossession

Housing has become one of the central social and ecological questions of our time [26,27]. Indeed, critical scholarship has repeatedly sought to raise awareness of an intensifying global housing crisis that, in recent years, comprises inter alia, insecure tenancies, higher entry barriers to local housing markets, soaring rental burdens, and notable increases in displacements and evictions [28–31]. Viewed in a larger context that encompasses decades of neoliberal restructuring, housing dispossession is the consequential concomitant of a wide-scale enclosure of public and urban spheres [32]. More precisely, it is the growing

financialization of the real estate sector that increasingly encloses housing, ranging from mortgage-backed securities and private mortgage-debts to the rise of global landlords in form of stock-listed housing companies or private equity funds [33,34]. The GFC already set a vivid example on how these processes incite displacement and dispossession, most notably seen in traditional homeownership countries like the USA or Spain [35,36]. As ownership rates were consequentially sinking over the last years, those processes now increasingly affect rentals: in form of REITs, where global investors accumulate ever larger portfolios of the rental market, most notably by purchasing (re)commodified social housing stocks and mortgage-defaulted assets, in many cases at discount rates [37,38]. As new landlords, those investors then often push up rents, driving displacements and jeopardizing local living conditions [39]. Coupled with the rise of platform capitalism in form of short-term rentals like Airbnb, those dynamics lead to a further disruption in touristifying neighborhoods [40]. Wachsmuth and Weisler [41] showed how Airbnb creates a new form of rent gap in fashionable and famous neighborhoods, as it requires only minimal capital investment beforehand. As a result, it becomes more appealing for property owners to end long-term rental contracts to shift their focus to short-term rentals. In addition, Airbnb provides professional players with flexible options of buy-to-let investment, given that they can resell tenant-free holiday homes at any time. As a consequence of this Airbnb-driven financialization of the rental sector, global corporate investors increasingly replace local landlords and rely more on affluent tourists than on low-income tenants. This has ramifications for the whole housing market: property prices and rents experience further spikes while urban neighborhoods lose their social cohesion [42–44]. As Hübscher et al. illustrated in the case of the island city Santa Cruz de Tenerife, Airbnb-led touristification increasingly impacts even small and medium-sized cities outside of the traditional tourism markets [45]. This is also related to politically-steered urban branding: in the course of a decades-long tourist marketing and the mercantilization of Spanish cities, city councils actively promoted inner-city touristification. Accordingly, city centers started to resemble more exhibition venues for tourists, lacking space for local businesses, retail, and services for the supply of residents. For city dwellers, the production of tourist spaces is, thus, closely linked to a loss of public spaces and urban life [46,47]. Hence, from the perspective of those affected, displacement and dispossession in all these contexts does not only involve the material loss of residential or commercial spaces but goes hand in hand with the uprooting from everyday references, relationships, and bonds [48].

In light of the ongoing COVID-19 pandemic and its wide-ranging socioeconomic reverberations, it is sheerly inevitable that the pandemic will also affect housing and reshuffle real estate investment strategies. While the pandemic's long-term urban housing outcomes are difficult to predict at this stage, until now, real estate markets seem to have eased some tensions, even in Spain. This is particularly apparent in the higher supply of rentals in previously tense housing markets and tourist destinations: given the (temporary) meltdown of international tourism, many short-term rental providers found themselves forced to head back to the traditional rental market [49,50]. However, many landlords only offer temporary rental contracts as they speculate on a medium-term return to pre-pandemic times. In other words, they want to avoid stable leases that limit their control over their assets at all costs. Therefore, once the pandemic ends and tourism resumes, short-term rentals are bound to return, unless a more ambitious regulatory policy framework is put in place [51–54]. A further explanation for a future revival of short-term rentals relates to stable investor expectations as Airbnb has soared on the stock market this year despite its heavy losses and reliance on institutional lenders [55,56]. Indeed, housing still offers attractive yields at a time of low interest rates, which is why real estate players have so far been reluctant to lower sales prices and rents significantly. Nevertheless, the majority of real estate players also expects a stronger slump in prices for rents and second homes, as well as in construction projects in 2021 and 2022, which, admittedly, is likely to affect real estate agencies with smaller portfolios in particular [57–59]. However, these macro-observations and preliminary projections of real estate sector developments should

not obscure the fact that numerous households—confronted with expiring rent moratoria, job losses, and ongoing economic losses—are already struggling to meet their mortgage or rent obligations [60,61]. What is more, in the midst of a pandemic, landlords and local authorities already enforced numerous (in several cases illegal) evictions in recent months, affecting vulnerable groups in particular [62–66]. After controversial debates, widespread public criticism, and organized protests from tenant movements, the socialist governing coalition has now suspended evictions, at least until May 2021. The eviction moratorium, though, involves financial compensation for house owners for defaulting rents from public funds, regardless if they are private or corporate landlords. In other words, the governing parties once again serve as a political backbone for speculative real estate accumulation. Additionally, the eviction moratorium only provides temporary alleviation while the pending issues to prevent evictions after its expiration and to guarantee affordable housing on the long term remain to be resolved [67–69]. Apart from the housing problems that low-income tenants face, likewise, a notable proportion of people managing local businesses, urban retail, and cultural institutions struggle to keep their businesses afloat, i.e., to sustain their livelihoods [70–73]. In December 2020, the Spanish government introduced an aid package for tourism, gastronomy, and retail in order to remedy the situation. However, the aid package mainly involves rent reductions of up to 50% for the tenants of big landlords; it does not include urgently needed direct financial aid for the shopkeepers themselves [74–77]. All these different modalities of crisis reactions shed light on the political economy of the pandemic: contrary to long-standing mantras of neoliberal economists, it becomes once again apparent that the economy, in this case the real estate sector, is not working entirely independent from the political realm but is intrinsically interwoven with and shaped by the political system. Throughout the last decades, the political system, more than restraining, provided the necessary legal framework for a reckless financialization. Nevertheless, political regulations, depending on their breadth and depth, could fundamentally determine and reshape the course of the economy [78]. Meanwhile, given the absence of deliberate regulatory policies, financial players are already sketching out their future investment plans, expecting to take advantage of faltering prices and defaulted asset sales [79–83]. As for Spain, it is likely that private equity funds yet again will play a dubious lead role in post-pandemic economic restructuring [83]. For instance, in April 2020, Blackstone—the world's largest private equity firm—finished raising a 9.8-billion-euro fund that will specifically target European real estate, allowing it to further consolidate market dominance over Spain's real estate sector [84,85]. At the same time, however, it is also likely that the emerging economic geographies of the pandemic will only exacerbate the austerity-led economic weaknesses of Europe's southern peripheries, given their dependence on tourism and small businesses [86]. Hence, rather than alleviating the housing crisis, the post-pandemic years might actually see a reinforcement of housing financialization and an even more substantial concentration of corporate-financial power in the real estate sector. Real estate will, thus, remain a popular type of investment and form of capital accumulation for transnational investors, thereby further exacerbating the precarious housing and living situations of low-income city dwellers [87].

These inextricable interconnections of housing, financialization, and dispossession, though global in scale, are not monolithic, i.e., they do not unfold uniformly across time and space. While there certainly exist strong linkages between global financial and real estate sectors, urban inequalities and local experiences of dispossession, contrastive considerations of the specificities of national, regional, and local housing policies and housing realities allow for a more nuanced portrayal of the variegated logics and experiences of real estate dispossession [13,88,89]. In this sense, case studies provide a valuable methodical lens to trace the regional or local logics of these globally interdependent dynamics and to understand how they unfold against different contexts. Therefore, the following sections strive to gradually introduce the research area and elaborate their particularities in the context of Spain's real estate development. Before that, however, I will shortly outline the methodical procedure of this paper.

3. Materials and Methods

As already mentioned, official data and statistics concerning dispossession in Spain are limited mainly on the regional scale of the judicial districts and do not differentiate between residential and commercial properties. The database ATLANTE (CGPJ), however, is an exception, listing all court-ordered mortgage foreclosures and tenant evictions on the Canary Islands on an intra-urban scale for the period 2001–2015. In addition, it entails nuanced remarks on the assets concerned, allowing for a sophisticated treatment of both residential and commercial properties. However, the judicial data I am dealing with still has some limits that should not be neglected. As Parreño-Castellano et al. [22] point out, a judicial registry naturally lists merely judicial acts or records. While those can be linked in many cases to a property, it is not often possible to associate the records with a person. In other words, I can only assess the number of properties, as the database does not entail information on the number of people affected. In addition, when interpreting the data on mortgage foreclosures and tenant evictions, it is important to bear in mind that loss of housing is not simply the consequence of individual households not being able to pay for rent or for a mortgage loan. In contrast, and as I elaborated in the preceding chapter, it is the material expression of a profound housing crisis and the outcome of a decade-long politically orchestrated enclosure, financialization, and touristification of public and urban spheres in Spain. With all its deficiencies and omittances, the following sections should make clear that judicial data, nonetheless, is a very valuable resource to portray urban inequalities related to real estate dispossession on a geographic microscale.

The methodological framework and methodical procedure draw on these data. As a first step, I aim to identify the temporalities and spatialities of dispossession on an intra-urban scale—divided into mortgage foreclosures and tenant evictions, as well as residential and commercial real estate dispossession. For the preparation of the material, I initially selected all 1695 entries in the database relating to the municipality of Arona in the south of Tenerife. After a thorough data cleansing and examination, 1414 entries remained, of which I georeferenced the 393 entries relating to the research area of LC-LA. Los Cristianos and Playa de Las Américas represent different administrative units, but given their urban morphology, they can be regarded as a single and connected agglomeration. The cartographic handling of the material follows a critical GIS-based (*Geographic information system*) concern to uncover socio-spatial inequalities. In the context of critical GIS, critical cartographers, inter alia, consider the technical possibilities of GIS as a means to enrich critical research [90–92]. As a second step, departing from the temporal-spatial analysis, I will address more recent real estate developments and delve deeper into local experiences of dispossession [93]. According to the principles of qualitative GIS, several scholars highlight the enriching potential of mixed-method approaches for geographical research. In this sense, a combination of quantitative GIS-data with qualitative methods such as non-representative, explorative surveys allows me to further nuance the general tendencies displayed by the database against the context of quotidian life [94,95]. For this purpose, during August 2018, I conducted 50 standardized questionnaires in the research area. In order to reach a greater portion of interviewees with potential experiences of dispossession, I carried out a non-random sample around the spatial hotspots of dispossession that I identified during the database-driven analysis before. On the one hand, the questionnaire aims to acquire knowledge about involuntary displacement of residential and commercial properties and, thus, looks behind the "tip of the iceberg" of court-ordered foreclosures and evictions. On the other hand, it inquires about living and working conditions as well as rent and mortgage burdens in order to evaluate the local experiences of dispossession against the backdrop of contemporary real estate markets. The latter also stems from a long-standing incitement of social polarization in the formation of Tenerife's tourist accumulation regime. As the next section explains, this arises from a specific historic and socio-economic constellation for the organization of capital flows.

4. Real Estate Boom in the South of Tenerife

Tenerife's south, with its emblematic tourist hotspot LC-LA, is a prime example of tourism-based real estate growth during Spain's boom years 1998–2007 [96]. In order to gain a more comprehensive picture of the regional dimensions of dispossession and displacement, it is crucial to retrace the genesis of its contemporary accumulation regime, based on tourism and real estate. Before that, though, I will briefly situate the research area in its insular context.

Regional planning policy divides Tenerife into different zones (*Zona Norte*, *Zona Metropolitana*, *Zona Sur*) which themselves are comprised of different municipalities (*municipios*), i.e., local government units. In the southern zone, the most southern municipality of Arona is located. Arona, in turn, is comprised of different population units (*unidades poblacionales*), i.e., distinct cities, towns, places, or villages within a municipality. In Arona, there are 15 population units that can be grouped regarding their distinctive functions in the urban hierarchy [97]. Starting from the higher altitudes, first, the population units north of the highway, Arona, Buzanada, Cabo Blanco, La Camella, Chayofa, and Valle de San Lorenzo, resemble traditional agricultural villages that settled around the more fertile soil in medium altitudes but lost their regional importance throughout the years, given the general reorientation towards coastal tourist areas. Second, Cho, El Fraile, Guargacho, Guaza, and Las Galletas constitute peripheral settlements near the coastal areas but outside the tourist agglomerations. With the exception of Las Galletas, which still is mainly a traditional fisher village, those settlements generally shelter the local population working in the coastal tourist cities. Those are, third, Costa del Silencio, Los Cristianos, Playa de Las Américas, and Palm-Mar. While Palm-Mar is mainly a recent real estate project with holiday homes, Costa del Silencio and LC-LA are bigger agglomerations with ports, shopping centers, hotels, shops, bars, restaurants, and other vital facilities of the tourist industry. Already, this short overview of the urban hierarchy of Arona should give an idea about the drastic shifts from agriculture towards tourist real estate that the economy of the archipelago experienced in a relatively short period of time.

For many decades now, the Canary Islands have been an important pillar of Spanish real estate growth. During the boom years, increases in construction volume and property prices significantly exceeded national dynamics [17] (p. 27). This stems largely from a territorial reorganization of the archipelago since the 1960s, in which the political elites promoted new tourist accumulation regimes, especially in the south of Tenerife. Once an arid region, the introduction of agricultural irrigation systems modernized the island's southern municipalities in the 1950s. Given widespread expectations of higher profitability in tourist destinations, water supply then gradually shifted from agricultural to tourist land use on the coastal areas. This meant, in other words, "the exploitation of spaces which had been hitherto undervalued" [98] (p. 30). New investments in fixed capital were then necessary as these new economic activities "required the creation of a physical infrastructure adequate to the needs of production and circulation of capital" [98] (p. 37). To this end, large local landowners cooperated closely with municipal administrations, which steered and promoted tourist real estate projects on the coastal areas and legally secured the planning and implementation of these projects via new zoning regulations. Particularly the *Plan Insular de Tenerife* (1969), commissioned to the planning agency Doxiadis Ibérica, set the tone for the following decades; it placed all the major upcoming infrastructure projects (autopista del Sur, aeropuerto Reina Sofia) in the south of Tenerife and designated Los Cristianos in the municipality of Arona as the future tourist center of the island [99]. Until 1980, real estate actors opened a total of 2967 hectares of land for tourism—1099 hectares in Arona alone. This close collaboration of owners and the municipal agents illustrates how the production of tourist spaces constitutes a "spatial fix" of capital in the built environment in which the state plays a key role in terms of its adapted regulations, its planning practices, and its ideological backing of capital interests [100]. Tragically, however, for many local landowners, while the initiatives for capital-switching came from local capital, in many cases, only joint ventures between big landowners from the Canary Islands

and peninsular or foreign investors proved to be successful. Given their lack of capital, smaller local landowners often could not establish themselves as tourist developers, forcing them to sell their plots to their wealthier competitors. Worth mentioning in particular is the joint venture between Antonio Domínguez Alfonso and the Catalan entrepreneur Rafael Puig Lluvina, who implemented the 281-hectare project Playa de Las Américas Fase III, thereby linking Los Cristianos morphologically with the previously completed Fase I and Fase II. In a nutshell, in less than three decades, this alliance of urban planning, large landowners and foreign investors managed to fundamentally redirect the accumulation regime from agricultural yield to tourist and real estate yield. As García-Herrera puts it, urbanization in the Canary Islands "took place without industrialization [98] (p. 36). This led to the configuration of LC-LA as Tenerife's tourist epicenter, determining—besides the metropolitan area Santa Cruz/La Laguna—the economic and spatial orientation of the island [99,101]. As a side effect of this fast reorientation of the accumulation regime, however, severe structural deficiencies in the urban process became apparent: housing shortage was very common among low-income families who, prior to the 1990s, needed to rely on self-help housing [98]. This type of housing then became the dominant morphology that constituted the new emerging peripheral settlements near the coastal areas. In the boom years of the 1990s, Spain's entry into the EU led to a further intensification of real estate investment, with German capital in particular participating in new tourism projects. Most recently, real estate development comprised the rest of the island, especially including peripheral settlements [102]. Despite all this, locals and non-EU migrants working in tourism and construction apparently have not been involved substantially in the profits of real estate growth. On the contrary, employment in these industries, which usually required no or very low qualifications, was highly precarious and characterized by temporary employment and low income [103]. In addition, social benefits and social housing policies were weak in the Canary Islands, even by national standards, so that raising a mortgage was often the only viable option to access housing [17,23]. In this sense, private mortgage debt took a firm hold in the quotidian life of the population [1] and further fueled social polarization.

Thus, the bursting of the real estate bubble only exacerbated pre-existing structural precarities and vulnerabilities. The construction volume stagnated from 28,798 newly initiated construction projects in 2006 to only 394 in 2014; at the same time, unemployment and insolvency erupted [17] (p. 29). On an interregional level, the subsequent waves of foreclosures affected the social fabric of the Canaries archipelago most severely, alongside Catalonia: in the period 2007–2012, on average, 8.8 foreclosures per 1000 inhabitants materialized [104] (p. 6). On an intraregional level, the tourist islands Fuerteventura and Lanzarote on a whole and the tourist regions in the South of Gran Canaria and Tenerife proved to be particularly affected [23]. One can get a first glimpse of the scope and magnitude of these events in the south of Tenerife by examining the variations in population growth in the municipality of Arona—given the absence of real estate-related indicators on an infra-municipal level (see Table 1). In my interpretation it is fair to assume that the very high population growth until 2008 accounted for excessive real estate growth during the boom years, while the declining and partly negative trends from 2008 onwards—especially in the coastal conurbations like Costa del Silencio and Los Cristianos—pointed to crisis-related housing losses.

Contrary to a widespread perception of real estate recovery in recent years, low-income residents are still struggling to gain a foothold in the housing market. On the one hand, as a result of defaulted assets and restrictions in mortgages, they depend more than ever on the rental sector. On the other hand, the penetration of the rental market with global investment funds and short-term rentals has led to significant rent increases, also in the Canary Islands. In this context, tenant evictions are on the rise since the outbreak of the housing crisis, as the cases of Las Palmas de Gran Canaria and Santa Cruz de Tenerife illustrate [4,24]. For urban agglomerations outside the island capitals, there are no conclusive studies in respect thereof yet. However, the massive concentration of Airbnb

offers in the hands of a few professional hosts in Arona and Adeje indicates that recent displacement dynamics are again affecting mainly the tourist destinations [105]. Especially in Los Cristianos, short-term rentals seem to pile up outside the hotel strongholds, i.e., in the residential areas [106] (p. 24). In the following empirical sections of this paper, I will explore these linkages in more detail.

Table 1. Population growth in % in the municipality Arona (2000–2017).

Population Unit	2000–2008	2008–2017	2000–2017
Municipality Arona	97.58	3.99	105.46
Arona	29.52	−5.08	22.93
Buzanada	85.99	9.94	104.48
Cabo Blanco	49.80	10.41	65.39
La Camella	60.52	11.32	78.70
Los Cristianos	85.10	−9.03	68.38
Cho	262.62	32.69	381.17
El Fraile	90.52	20.47	129.52
Las Galletas	118.76	5.67	131.16
Guaza	133.88	12.24	162.50
Costa del Silencio	242.59	−12.39	200.14
Chayofa	167.53	0.40	168.60
Palm-Mar	533.89	91.15	1111.67
Playa de Las Américas	91.09	1.32	93.60
Valle de San Lorenzo	71.39	3.76	77.84
Guargacho	127.13	1.68	130.94 [1]

[1] INE. Nomenclátor: Población del Padrón Continuo por Unidad Poblacional. Own elaboration.

5. Dispossession and Displacement in Los Cristianos/Las Américas

After having outlined the theoretical and regional contexts, the main section of this paper now proceeds with a nuanced analysis of dispossession and displacement dynamics in LC-LA. In a first subsection, I will expose the temporal and spatial distributions of court-ordered dispossessions on an intra-urban level. After that, against the context of a real estate market penetrated by price-driving short-term rentals, in a second subsection, I will look at more recent developments and local experiences of dispossession.

5.1. Temporalities and Spatialities of Dispossession

Figure 2 provides an insight into the temporal evolution of dispossessions. In line with national trends, the major share of dispossessions in Arona coincides with the years following the outbreak of the housing crisis. Accordingly, this share mainly involves mortgage foreclosures. For the period during the boom years, the database does not display any mortgage foreclosures in the research area. Even on the municipal level, only seven mortgage foreclosures are recorded in that period, all between 2006–2008. This near absence in the pre-crisis years again underscores how mortgage foreclosures only achieved widespread, albeit doubtful, fame through the housing crisis. However, the last two years of the observation period reveal a slight but notable increase in tenant evictions. Table 2, in turn, elaborates these tendencies on the infra-municipal level. Mortgage foreclosures still dominate in almost all population units of the municipality, yet Los Cristianos and Playa de Las Américas record the highest percentage of tenant evictions. On top of that, the conurbation also concentrates the biggest number of dispossessions: 393 court-ordered proceedings, which account for 27.8% of all dispossessions recorded in Arona. If we relate the figures with the population, it becomes further apparent that, apart from the peripheral settlements of Guaza (29.68‰) and Guargacho (37‰), the dispossession rates are highest in Playa de Las Américas (23.7‰). Therefore, the conurbation deserves special consideration with regard to both the amount of dispossessions and the degree to which they affect the population.

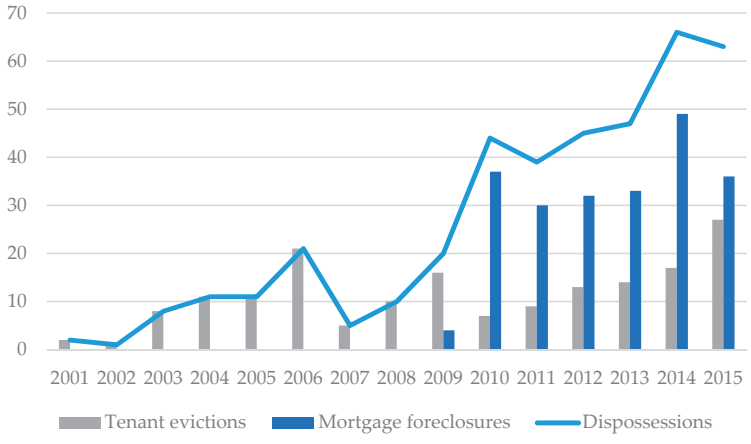


Figure 2. Evolution of dispossession in Arona (2001–2015). Database ATLANTE. Own elaboration.

Table 2. Real estate dispossession in the population units of Arona 2001–2015.

Population Unit	Dispossession	Tenant Evictions (%)	Mortgage Foreclosures (%)
Municipality Arona	1414	30.55	69.45
Arona	34	11.76	88.24
Buzanada	50	22.00	78.00
Cabo Blanco	100	17.00	83.00
La Camella	69	17.39	82.61
Los Cristianos	272	40.07	59.93
Cho	55	29.09	70.91
El Fraile	121	33.88	66.12
Las Galletas	79	32.91	67.09
Guaza	59	27.12	72.88
Costa del Silencio	182	27.47	72.53
Chayofa	34	26.47	73.53
Palm-Mar	28	25.00	75.00
Playa de Las Américas	121	52.07	47.93
Valle de San Lorenzo	136	19.12	80.88
Guargacho	74	33.78	66.22 [1]

[1] Database ATLANTE (CGPJ). Own elaboration.

Indeed, already the temporalities in LC/LA exhibit peculiarities that distinguish it from the municipal level. Although mortgage foreclosures also dominated the years following the outbreak of the crisis (49 cases in 2014 alone) and throughout the whole observation period (56.23%), tenant evictions bear a much stronger role than in other population units of Arona. Tenant evictions in the pre-crisis years 2001–2007 alone accounted for 15.01% of all dispossessions in the research area. On the municipal level, the corresponding figure amounted to only 9.33%. This illustrates that unstable and insecure housing conditions in the rental sector already attained significance in the pre-crisis years [107]. The steady rise in tenant evictions from 2010 onwards in turn indicates that the dynamics of displacement and dispossession increasingly shifted to the rental sector in recent years [4].

However, it is also clear that these dynamics do not affect the entire urban area equally. Based on the findings that the coastal cities in Arona particularly registered negative population trends from 2008 onwards, an initial analysis of the census sections located in LC/LA found that especially the sections in central locations around the promenades and Montaña Chayofita displayed the greatest population losses since 2008. As a more nuanced point density analysis of all the georeferenced dispossessions indicates, this also

reflects the spatially dominant patterns of intra-urban real estate losses (see Figure 3). In that regard, the historical center of Los Cristianos recorded the highest density of dispossessions, essentially being mortgage foreclosures. Tenant evictions, by contrast, did not cluster in a similarly prominent way. While they predominated generally in Playa de Las Américas (52.07% of all tenant evictions), they were much more scattered (not taking into account the urbanización El Camisón), owing to the more expansive morphology of this segment of the conurbation. These patterns reflect case studies from the Balearic Islands, where researchers also observed clusters of mortgage foreclosures and scattering of tenant evictions [3,108]. Another inner-city hotspot worth mentioning is the Edificio Edén located northeast of the historical center of Los Cristianos. A temporary employment agency and the municipality's employment agency operate in the building, which, thus, serves as a reference point for residents working in the local tourism and services industry. The concentrations of dispossessions recorded there, therefore, offer initial insights into the socioeconomic repercussions of dispossession, which I will discuss in more detail in the following chapter.

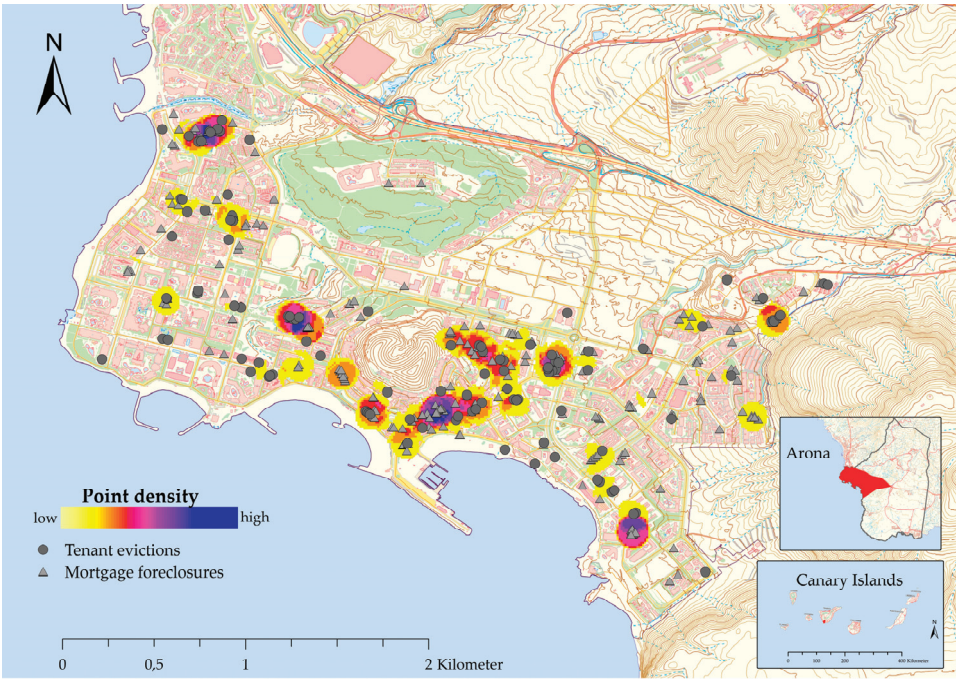


Figure 3. Density of real estate dispossession in Los Cristianos/Las Américas (2001–2015). Database ATLANTE (CGPJ). Own elaboration. Mapa topográfico Grafcan (2014).

As mentioned before, a distinctive feature of the database is that it allows me to differentiate between residential and commercial properties (stores, restaurants, offices). In that manner, I could assign 70 of the 393 georeferenced dispossessions to commercial properties that cluster mainly around shopping centers in Playa de Las Américas; the northwesternmost foothills exhibit the highest concentration. Hence, the repercussions of the housing crisis proved to not only jeopardize residential but also working spaces.

In the following subsection, I will examine these interrelationships in more detail with regard to the socio-economic situations and housing conditions of the interviewees. In this way, I seek to develop a more qualitative and differentiated approach to capture the multifarious ways and urban contexts in which dispossession affects people.

5.2. Local Experiences of Dispossession and Displacement

The intra-urban analysis of the temporalities and spatialities of dispossession patterns already brought to light that tenant evictions have been increasing in recent years and that real estate dispossession also affects commercial properties to a considerable extent. Now portraying the key findings of the standardized questionnaires conducted in the research area in 2018, I aim to further shed light on the concomitant precarizations in the access to living and working spaces. For this purpose, I will (i) outline the social profile of the interviewees before (ii) identifying contemporary and dominant forms of dispossession, also in terms of their spatial context. The section closes (iii) with an account of present housing uncertainties against the backdrop of high housing cost burdens.

Most of the interviewees were 18–50-year-old employees or self-employed shop keepers with comparatively high educational qualifications. Scholars have already highlighted the high level of over-qualification in the tourism sector, i.e., that job offers and income opportunities do not necessarily match the degrees achieved [103,109]. In addition, a large share of 65% of the interviewees did not live in the conurbation for more than four years, which is only consequential, given the predominance of migration backgrounds (mainly South America and EU member states). Accordingly, the local experiences of dispossession reconstructed here largely reflect more recent years and are, amongst other factors, shaped by alien status.

Considering the housing situation revealed that a large part of the interviewees now lived in rental housing, while mortgages did not attach much importance anymore. Thus, it did not come as a surprise that the interviewees saw rent increases as the essential reason for having to abandon and leave their living and working spaces involuntarily (see Figure 4); indeed, of the 50 respondents, 62% reported experiencing involuntary loss of residential and commercial properties themselves or hearing it from others. This is also true for people with migration backgrounds; of the 29 interviewees with foreign origin (outside of Spain), 55% experienced real estate dispossession, either directly or in their social surroundings. While the data is far from being conclusive here, it clearly is in line with a more recent case study from Las Palmas de Gran Canaria that shed light on the unequal exposure of the foreign population to real estate dispossession [110]. At the same time, the lower purchasing power of customers as a result of the crisis proved to be a major problem for shop keepers in particular, forcing them to close their stores. Since I conducted the majority of the interviews with shopkeepers, consequently two-thirds of the experiences of dispossession related to commercial properties. The involuntarily abandoned stores were, as might be expected, locally operated, tourism-oriented bars and restaurants, as well as clothing and decorating stores. Today, many of these stores are vacant, but the majority are managed by new owners, for whom some of the interviewed former shopkeepers now work as employees. By contrast, job losses and mortgage debt have ceased to be relevant drivers for displacement. An interviewed real estate agent confirmed this general shift, stating that since at least 2015, rent increases have started to be the dominant drivers for displacement, especially with the advent of short-term rental platforms such as Airbnb. That being said, there seems to be little sign of the housing vacancy that became such a common feature of the housing crisis as 36% of respondents had no knowledge of vacant apartments, while 52% stated that not a single apartment in their immediate area was vacant. In turn, 36% knew about short-term rentals in their neighborhood with individual respondents stating that, today, most apartments were rented to more affluent tourists. In other words, in the context of the financialization of the rental sector, new dynamics of dispossession and displacement are unfolding at the national [14] and regional level [4].

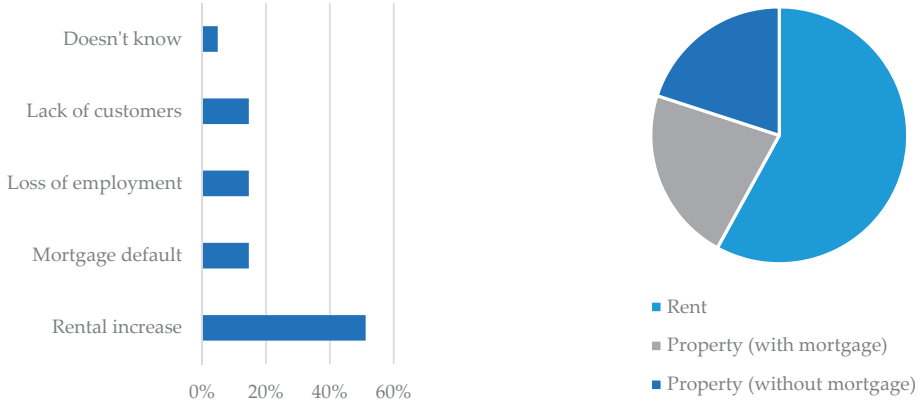


Figure 4. Reasons for dispossession (**left**) and type of ownership (**right**). Own elaboration.

The interviewees related their experiences of dispossession mostly to Los Cristianos and Playa de Las Américas, in part also to Tenerife and Lanzarote, i.e., to nearby local and regional contexts. However, many interviewees were unaware of the whereabouts of the displaced persons (insofar as they themselves were not affected)—which makes it clear that dispossession often goes hand in hand with the loss of everyday references, relationships, and bonds [48]. More general statements, in turn, argued that most of the migrants concerned had returned to their countries of origin, while many locals were forced to return to live with their families.

Furthermore, more than a decade after the GFC, a fresh start on the housing market still is out of the question, as the current income levels of the interviewees revealed staggeringly high mortgage and rent burdens. Indeed, out of the 80% of interviewees who lived in rental or mortgaged housing, 47.5% had to dedicate more than 40% of their income to monthly housing costs. These figures clearly exceed the threshold of 30%, which scholars frequently invoke in the debate on affordable housing [111]. On top of that, housing cost burdens are closely related to experiences of dispossession; those who have to bear high monthly housing costs tend to know more about dispossession and vice versa. In this sense, dispossession and displacement unfold especially in the quotidian life of low-income groups. Hence, more than ten years after the outbreak of the housing crisis, housing insecurity still shapes contemporary urbanism and the fortunes and misfortunes of urban dwellers in LC-LA.

6. Discussion

The interconnections of housing financialization and dispossession, observed at the global level, bear their own manifestations in the Canary Islands. The case study presented here pointed out that dispossession and displacement are increasingly reverberating in the rental sector in recent years—in a similar fashion to what scholars have already been observing at the global [30] and national level [14]. At the same time, however, the case study emphasized the contextual nuances or variegated logics of these global processes [89]. In Spain, housing insecurity stems in large part from politically questionable practices—involving inter alia, illegal mortgage lending, and the creation of REITs—that have enabled real estate speculation for decades without introducing any significant measures to guarantee affordable and accessible housing for low-income groups [13]. In the Canary Islands, this is closely linked with the formation of tourist accumulation regimes, set in motion by an alliance of big local landowners, foreign investors, and regional administrations from the 1960s onwards and backed by precarious labor and housing conditions [98,99]. This social polarization set the stage for the socially devastating effects

of the housing crisis and its persistence until today. It is important to note that the state played a key role here. With its adapted regulations, planning practices, and the ideological backing of capital interests, it enabled and steered the production of tourist spaces as a "spatial fix" for capital [100].

The case study of LC/LA allowed me to pin down this reconfiguration of displacement and dispossession dynamics and their unfoldment at the intra-urban level. The major share of dispossessions are mortgage foreclosures, which mainly concern residential properties and the historical center of Los Cristianos. At the same time, however, a notable proportion of dispossessions also involves commercial properties. Additionally, tenant evictions have experienced an upswing in recent years. In this regard, the standardized questionnaires illustrated that the recent financialization of the rental sector [14] in practice is tantamount to staggeringly high housing cost burdens. Rising rents, in this sense, ostensibly displace low-income households and shopkeepers. Considering the genesis of Tenerife's accumulation regime, it is striking how low-income groups and vulnerable households for decades now have to bear the burden of an ideological project that (i) rests on the assumption of endless tourist valorization of real estate and was and is foremost (ii) led by capital interests but ultimately (iii) backed and fueled by state institutions. The theoretical contribution of this study, thus, lies in linking these distinct pathways of capital-switching in the Canary Islands since the 1950s with contemporary global debates on financialization and touristification. In this sense, it provides a more nuanced framework to trace and assess the emerging and prevailing urban inequalities of the archipelago.

Further research and data are necessary to gain more comprehensive insight into these dynamics. This implies outlining the intra-urban court-ordered dispossessions subsequent to the observation period, which should be spatially compared with the available supply of short-term rentals and their development over time. Along with this, in-depth qualitative interviews would allow me to delve deeper into the narratives and even lived experiences of dispossession beyond the mere quantitative data available, taking into account the perspectives of real estate agents, urban planners, social workers, and those affected by dispossession. Beyond that, expanding the research on intra-urban ownership structures would provide crucial and possible insights into the penetration of institutional investors into urban housing markets after the repossession of assets. On a conceptual level, the relationship between the price developments of local urban housing markets and the dispossession of low-income earners also requires closer consideration. This might imply working with extensive surveys to expand on the CPGJ-data's limits regarding household members.

However, more comprehensive social housing policies and a political commitment to implement them are also needed. In the Canary Islands, critical scholars debated and argued for a stronger regulation of the speculative tourist sector for years. Previous efforts to introduce a moratorium on short-term rentals have fizzled out though [4,112]. Given that national and regional policies, thus, show little willingness to provide affordable housing, the hope of critical scholarship rests on the insurgent practices of social movements [113]. In the years following the outbreak of the housing crisis, however, unlike in other Spanish cities, there has been no significant mass movement against housing displacement in the Canary Islands [114]. Regarding the south of Tenerife, the dispersed distribution of peripheral working-class settlements, combined with a migrant population working in the tourism sector but only loosely rooted locally, is likely limiting the possibilities for social mobilization. Future research, therefore, should also aim to engage residents and those affected more actively in the research process, as this has proven to be a helpful means of promoting collective self-determination [115]. Critical geographic research, thus, has a central role to play in mobilizing the numerous people affected by the displacement of living and working space in the Canary Islands, who have not yet achieved a meaningful and resistant form of collective organization.

What is more, the novelty of the current situation underscores the necessity of continuous critical research as it is vital to grasp how housing insecurities are shaped during and

beyond the COVID-19 pandemic. At a first and general glance, rather than being a social leveler, the ongoing pandemic proves to exacerbate pre-existing inequalities [116]. While the pandemic's more specific consequences in terms of its urban housing outcomes are difficult to predict at this stage, it is very likely that the relentless dynamics of real estate financialization will make the housing and living conditions of low-income city dwellers more precarious [49–87]. Tragically, as the pandemic advances, protest options are further hampered, because collective organizing, such as rent strikes, can only take place online or in compliance with social distancing [117]. Meanwhile, global investors like Blackstone are already preparing for a novel speculative round of housing accumulation on a large scale [79–86]. Precisely because of these uncertainties and ambiguities associated with the pandemic, it will be more necessary than ever for critical research to focus and expand on the dynamics of accumulation and dispossession. In that regard, the potential of critical housing research resides in providing more comprehensive and transferable knowledge of the pandemic's housing consequences and the obstacles that urban dwellers will face beyond the 2020s. To conclude with a hopeful notion, the acquired critical knowledge—if made properly available for the public in general and the people affected in particular—can then serve as a catalyst for societal change to expand (again) the social function of housing.

Funding: This research received no external funding.

Informed Consent Statement: Since primary data was collected by means of questionnaires, all subjects involved in the study were informed about their aims and publication of the results.

Data Availability Statement: The Consejo General del Poder Judicial (CGPJ) provided the ATLANTE database to colleagues of the Universidad de La Laguna. Unfortunately, the database is not avalaible online.

Acknowledgments: This paper has been possible thanks to the research projects of the Ministerio de Ciencia, Innovación y Universidades. Agencia estatal de investigación: El conflicto urbano en los espacios de reproducción. La vivienda como escenario de conflictividad social (RTI2018-094142-B-C22); from the Ministerio de Economía y Competitividad. Agencia estatal de investigación, y Fondo Europeo de Desarrollo Regional (FEDER): Crisis y vulnerabilidad social en ciudades insulares españolas; the project Contested Territories financed by the European Union research and innovation program Horizon 2020 with the reference Marie Skłodowska-Curie number 873082 (CONTESTED_TERRITORIES); as well as the Pre-Doc Award program at Leipzig University. I further acknowledge support from Leipzig University for Open Access Publishing.

Conflicts of Interest: The author declares no conflict of interest.

References

1. García-Lamarca, M.; Kaika, M. 'Mortgaged lives': The biopolitics of debt and housing financialization. *Transactions* **2016**, *41*, 313–327. [CrossRef]
2. Schwaller, C. Crisis, austerity and the normalisation of precarity in Spain—In academia and beyond. *Soc. Anthropol.* **2019**, *27*, 33–47. [CrossRef]
3. González-Pérez, J.M.; Vives-Miró, S.; Rullan, O. Evictions for unpaid rent in the judicial district of Palma (Majorca, Spain): A metropolitan perspective. *Cities* **2020**, *97*, 102466. [CrossRef]
4. Parreño-Castellano, J.; Domínguez-Mujica, J.; Armengol-Martín, M.; Pérez-García, T.; Boldú Hernández, J. Foreclosures and Evictions in Las Palmas de Gran Canaria during the Economic Crisis and Post-Crisis Period in Spain. *Urban Sci.* **2018**, *2*, 109. [CrossRef]
5. Di Feliciantonio, C.; Aalbers, M.B. The Prehistories of Neoliberal Housing Policies in Italy and Spain and Their Reification in Times of Crisis. *Hous. Policy Debate* **2018**, *28*, 135–151. [CrossRef]
6. Mas, I.M. *Capitalismo y Turismo en España. Del "Milagro Económico" a la "Gran Crisis"*; Alba Sud Editorial: Barcelona, Spain, 2015; Available online: www.albasud.org/publ/docs/68.ca.pdf (accessed on 16 December 2020).
7. Hof, A.; Blázquez-Salom, M. The Linkages between Real Estate Tourism and Urban Sprawl in Majorca (Balearic Islands, Spain). *Land* **2013**, *2*, 252–277. [CrossRef]
8. Marisol, G. The Breakdown of the Spanish Urban Growth Model: Social and Territorial Effects of the Global Crisis. *Int. J. Urban Reg. Res.* **2010**, *34*, 967–980.
9. Sabaté, I. To repay or not to repay: Financial vulnerability among mortgage debtors in Spain. *Etnografica* **2018**, *22*, 5–26. [CrossRef]
10. Burriel, E.L. Empty urbanism: The bursting of the Spanish housing bubble. *Urban Res. Pract.* **2016**, *9*, 158–180. [CrossRef]

11. Cano Fuentes, G.; Etxezarreta Etxarri, A.; Dol, K.; Hoekstra, J. From Housing Bubble to Repossessions: Spain Compared to Other West European Countries. *Hous. Stud.* **2013**, *28*, 1197–1217. [CrossRef]
12. Padberg, S.; Schraven, M. "Warum Spanien ein paar Jahre reich war?"—Darf mit Wohnungen spekuliert werden? *GW Unterr.* **2015**, *139*, 42–53. Available online: www.gw-unterricht.at/images/pdf/gwu_139_42_53_padperg_schraven.pdf (accessed on 16 December 2020).
13. Janoschka, M.; Alexandri, G.; Ramos, H.O.; Vives-Miró, S. Tracing the socio-spatial logics of transnational landlords' real estate investment: Blackstone in Madrid. *Eur. Urban Reg. Stud.* **2020**, *27*, 125–141. [CrossRef]
14. Vives-Miró, S. New rent seeking strategies in housing in Spain after the bubble burst. *Eur. Plan. Stud.* **2018**, *26*, 1920–1938. [CrossRef]
15. Muñiz, Í.O. Análisis geográfico de los desahucios en España. *Ería* **2014**, *95*, 327–342.
16. Méndez Gutiérrez del Valle, R. De la hipoteca al desahucio: Ejecuciones hipotecarias y vulnerabilidad territorial en España. *Rev. Geogr. Norte Gd.* **2017**, *67*, 9–31. [CrossRef]
17. Hernández, J.S.G.; Rodríguez, M.D.C.D.; Herrera, L.M.G. Auge y crisis inmobiliaria en Canarias: Desposesión de vivienda y resurgimiento inmobiliario. *Investig. Geogr.* **2018**, *69*, 23–39.
18. Gutiérrez, A.; Arauzp-Carod, J.-M. Spatial Analysis of Clustering of Foreclosures in the Poorest-Quality Housing Urban Areas: Evidence from Catalan Cities. *ISPRS Int. J. Geo Inf.* **2018**, *7*, 23. [CrossRef]
19. Barrado, V.J.; Martín, J.M.S. Banca privada y vivienda usada en la ciudad de Madrid. *Investig. Geogr.* **2016**, *66*, 43–58.
20. Vives-Miró, S.; González-Pérez, J.M.; Rullan, O. Home dispossession: The uneven geography of evictions in Palma (Majorca). *DIE ERDE J. Geogr. Soc. Berl.* **2015**, *146*, 113–126.
21. Vives-Miró, S.; Rullan, O. Desposesión de vivienda por turistización? Revalorización y desplazamientos en el Centro Histórico de Palma (Mallorca). *Rev. Geogr. Norte Gd.* **2017**, *67*, 53–71. [CrossRef]
22. Castellano, J.M.P.; Mujica, J.D.; Martín, M.T.A.; Hernández, J.B.; García, T.P. Real estate dispossession and evictions in Spain: A theoretical geographical approach. *BAGE* **2019**, *80*, 1–25. [CrossRef]
23. Del Carmen Díaz Rodríguez, M.; Ginés de la Nuez, C.; García-Hernández, J.S.; Armas-Díaz, A. Desposesión de Vivienda y Crisis Social en Canarias. In Proceedings of the Naturaleza, Territorio y Ciudad en un Mundo Global, Actas del XXV Congreso de la Asociación de Geógrafos Españoles, Madrid, Spain, 25–27 October 2017; pp. 1025–1034.
24. García-Hernández, J.S.; Armas-Díaz, A.; del Carmen Díaz Rodríguez, M. Desposesión de vivienda y turistificación en Santa Cruz de Tenerife (Canarias-España): Los desahucios a in-quilinos en el barrio de El Toscal. *BAGE* **2020**, *87*. [CrossRef]
25. García-Hernández, J.S.; Gínes de la Nuez, C. Geografías de la desposesión en la ciudad neoliberal: Ejecuciones hipotecarias y vulnerabilidad social en Santa Cruz de Tenerife (Canarias-España). *EURE Santiago* **2020**, *46*, 215–234. [CrossRef]
26. Unterzeichnenden, D. Für eine wirklich soziale Wohnungspolitik: Wissenschaftler_innen fordern Schutz der Bestandsmieten, Gemeinnützigkeit und Demokratisierung. *Sub Urban Z. Krit. Stadtforsch.* **2018**, *6*, 205–222. [CrossRef]
27. Vollmer, L.; Michel, B.; Wohnen in der Klimakrise. Wohnen in der Klimakrise: Die Wohnungsfrage als ökologische Frage: Aufruf zur Debatte. *Sub Urban Z. Krit. Stadtforsch.* **2020**, *8*, 163–166. [CrossRef]
28. Fields, D.J.; Hodkinson, S.N. Housing Policy in Crisis: An International Perspective. *Hous. Policy Debate* **2018**, *28*, 1–5. [CrossRef]
29. Madden, D.; Marcuse, P. The Politics of Crisis. In *Defense of Housing*; Verso: London, UK, 2016.
30. Soederberg, S. Evictions: A Global Capitalist Phenomenon. *Dev. Chang.* **2018**, *49*, 286–301. [CrossRef]
31. Wetzstein, S. The global urban housing affordability crisis. *Urban Stud.* **2017**, *54*, 3159–3177. [CrossRef]
32. Hodkinson, S. The new urban enclosures. *City* **2012**, *16*, 500–518. [CrossRef]
33. Aalbers, M.B. Financial geography II: Financial geographies of housing and real estate. *Prog. Hum. Geogr.* **2019**, *43*, 376–387. [CrossRef]
34. Heeg, S. Wohnen als Anlageform: Vom Gebrauchsgut zur Ware. Emanzipation. *Z. Sozial. Theor. Prax.* **2013**, *6*, 5–20. Available online: www.emanzipation.org/articles/em_3-2/e_3-2_heeg.pdf (accessed on 16 December 2020).
35. Aalbers, M.B. Geographies of the financial crisis. *Area* **2009**, *41*, 34–42. [CrossRef]
36. Martin, R. The local geographies of the financial crisis: From the housing bubble to economic recession and beyond. *J. Econ. Geogr.* **2011**, *11*, 587–618. [CrossRef]
37. Beswick, J.; Alexandri, G.; Byrne, M.; Vives-Miró, S.; Fields, D.; Hodkinson, D.; Janoschka, M. Speculating on London's housing future. The rise of global corporate landlords in 'post-crisis' urban landscapes. *City* **2016**, *20*, 321–341. [CrossRef]
38. Wijburg, G.; Aalbers, M.B.; Heeg, S. The Financialisation of Rental Housing 2.0: Releasing Housing into the Privatised Mainstream of Capital Accumulation. *Antipode* **2018**, *50*, 1098–1119. [CrossRef]
39. August, M.; Walks, A. Gentrification, suburban decline, and the financialization of multi-family rental housing: The case of Toronto. *Geoforum* **2018**, *89*, 124–136. [CrossRef]
40. Aalbers, M.B. Introduction to the Forum: From Third to Fifth-Wave Gentrification. *Mag. Econ. Soc. Geogr.* **2019**, *110*, 1–11. [CrossRef]
41. Wachsmuth, D.; Weisler, A. Airbnb and the rent gap: Gentrification through the sharing economy. *J. Econ. Geogr.* **2018**, *50*, 1147–1170. [CrossRef]
42. Cocola-Gant, A.; Gago, A. Airbnb, buy-to-let investment and tourism-driven displacement: A case study in Lisbon. *Environ. Plan. A Econ. Space* **2019**. [CrossRef]

43. Garcia-López, M.-À.; Jofre-Monseny, J.; Mazza, R.M.; Segú, M. Do Short-term Rental Platforms affect Housing Markets? Evidence from Airbnb in Barcelona. *J. Urban Econ.* **2020**, *119*, 103278. [CrossRef]
44. Montezuma, J.; McGarrigle, J. What motivates international homebuyers? Investor to lifestyle 'migrants' in a tourist city. *Tour. Geogr.* **2019**, *21*, 214–234. [CrossRef]
45. Hübscher, M.; Schulze, J.; zur Lange, F.; Ringel, J. The impact of Airbnb on a non-touristic city. A Case study of short-term rentals in Santa Cruz de Tenerife (Spain). *Erdkunde* **2020**, *74*, 191–204. [CrossRef]
46. España, K.; Toscano, B.V. Städte zu verkaufen: Prozesse der Enteignung und Praktiken der Wiederaneignung in Spanien. *Sub Urban Z. Krit. Stadtforsch.* **2019**, *7*, 7–26. [CrossRef]
47. Blázquez-Salom, M.; Blanco-Romero, A.; Gual Carbonell, J.; Murray, I. Tourist Gentrification of Retail Shops in Palma (Majorca). In *Overtourism: Excesses, Discontents and Measures in Travel and Tourism*; Milano, C., Cheer, J.M., Novelli, M., Eds.; CABI Publishing: Wallingford, UK, 2019; pp. 39–69.
48. Blomley, N. Enclosure, Common Right and the Property of the Poor. *Soc. Leg. Stud.* **2008**, *17*, 311–331. [CrossRef]
49. Bayona, E. El Pinchazo de la Burbuja del Alquiler por el Coronavirus en seis Claves. *Público*, 3 May 2020. Available online: www.publico.es/economia/burbuja-alquiler-pinchazo-burbuja-alquiler-coronavirus-seis-claves.html(accessed on 23 December 2020).
50. Otto, C. El COVID-19 Acorrala los Pisos de Airbnb: "Ganaba 3.700€ al Mes y Ahora Pierdo 1.000". *El Confidencial*, 29 April 2020. Available online: www.elconfidencial.com/tecnologia/2020-04-29/coronavirus-covid-airbnb-pisos-idealista_2554019/(accessed on 23 December 2020).
51. Zuil, M.; Muñoz, C.; Learte, P.L.; Rodríguez, L. El Alquiler que nos Deja la Pandemia. Anuncios en Madrid y Barcelona. *El Confidencial*, 21 June 2020. Available online: www.elconfidencial.com/vivienda/2020-06-21/un-60-mas-anuncios-pero-mismos-precios-asi-ha-cambiado-la-pandemia-el-alquiler_2645771/(accessed on 23 December 2020).
52. Cocola-Gant, A. Short-Term Rentals, COVID-19 and Platform Capitalism. *Alba Sud*. 25 May 2020. Available online: www.albasud.org/blog/en/1220/short-term-rentals-covid-19-and-platform-capitalism (accessed on 28 December 2020).
53. Gil, J. ¿Qué Hacemos con Airbnb Cuando se Supere la Pandemia? *El Salto*, 17 November 2020. Available online: www.elsaltodiario.com/airbnb/javier-gil-que-hacemos-con-airbnb-cuando-supere-covid19-pandemia(accessed on 28 December 2020).
54. Armas-Díaz, A.; Smigiel, C.; Janoschka, M. Stadt|Tourismus Kritisch Hinterfragt—Zur Einführung in ein Aufstrebendes Forschungsfeld. *Ber. Geogr. Landeskd.* **2021**, *49*. in press.
55. Waters, R.; Lee, D.; Kruppa, M. Airbnb Soars on Debut in Latest IPO Bounce. *Financial Times*, 10 December 2020. Available online: www.ft.com/content/a1c5cc26-b224-470a-84fe-8a6575fd33dc(accessed on 28 December 2020).
56. Molina, C. Airbnb se Valora en 25.000 Millones en una OPV con la que Pretende Ingresar 2.300 millones. *CincoDías*, 1 December 2020. Available online: https://cincodias.elpais.com/cincodias/2020/12/01/companias/1606827671_036526.html(accessed on 28 December 2020).
57. Nieves, V. ¿Por Qué Apenas Baja el Precio de la Vivienda en Medio de la Mayor Crisis en Décadas? *elEconomista*, 14 December 2020. Available online: www.eleconomista.es/vivienda/noticias/10927322/12/20/Por-que-apenas-baja-el-precio-de-la-vivienda-en-medio-de-la-mayor-crisis-en-decadas.html(accessed on 28 December 2020).
58. López Letón, S. 2021, El Año en El que El Precio de la Vivienda Volverá a Caer. *El País*, 20 December 2020. Available online: https://elpais.com/economia/2020-12-19/2021-el-ano-en-el-que-el-precio-de-la-vivienda-volvera-a-caer.html(accessed on 28 December 2020).
59. elEconomista. El Sector Inmobiliario Reconoce Que Las Caídas del Precio de la Vivienda Llegarán en los Próximos Meses. *elEconomista*, 17 December 2020. Available online: www.eleconomista.es/vivienda/noticias/10949012/12/20/El-sector-inmobiliario-reconoce-que-las-caidas-del-precio-de-la-vivienda-llegaran-en-los-proximos-meses.html(accessed on 28 December 2020).
60. Iriarte, M. El 20% de Los Españoles ya Tiene Problemas Para Pagar su Hipoteca o Alquiler. *El Mundo*, 4 December 2020. Available online: www.elmundo.es/economia/ahorro-y-consumo/2020/12/04/5fca2d6efc6c8351308b45ae.html(accessed on 28 December 2020).
61. Salvador, R. 400.000 Hogares, en Riesgo de Impagar el Alquiler Por la Crisis. *La Vanguardia*, 8 July 2020. Available online: www.lavanguardia.com/economia/20200708/482187380970/hogares-espana-riesgo-impagar-alquiler-crisis-coronavirus.html(accessed on 28 December 2020).
62. Valls, F. Vuelven Los Desahucios, Crece la Pobreza. *El País*, 27 June 2020. Available online: https://elpais.com/espana/catalunya/2020-06-27/vuelven-los-desahucios-crece-la-pobreza.html(accessed on 28 December 2020).
63. López, H. Desahuciadas Cuatro Familias con Niños Pequeños en Plena Pandemia. *El Periódico*, 15 October 2020. Available online: www.elperiodico.com/es/barcelona/20201015/un-fondo-inversor-desahucia-a-cuatro-familias-con-menores-en-plena-pandemia-8156731(accessed on 28 December 2020).
64. Tolosa, L. La Vulnerabilidad Frente a Los Desahucios: "No Estamos Viviendo, Estamos Sobreviviendo". *El País*, 4 December 2020. Available online: https://elpais.com/economia/2020-12-03/la-vulnerabilidad-frente-a-los-desahucios-no-estamos-viviendo-estamos-sobreviviendo.html(accessed on 28 December 2020).
65. teleSUR. En Pleno Rebrote de la Pandemia Aumentan Desahucios en España. *teleSur*, 25 November 2020. Available online: www.telesurtv.net/news/espana-exigen-frenar-desahucios-pandemia-rebrote--20201125-0020.html(accessed on 28 December 2020).
66. Smith, T. Spain Housing: Evictions and Broken Promises in a Pandemic. *BBC News*, 14 December 2020. Available online: www.bbc.com/news/55231201(accessed on 28 December 2020).

67. Riveiro, A.; Plaza, A. El Gobierno Paralizará Los Desahucios de Personas Vulnerables Mientras Dure el Estado de Alarma. *elDiario*, 2 December 2020. Available online: www.eldiario.es/politica/gobierno-paralizara-desahucios-personas-vulnerables-dure-alarma_1_6477157.html(accessed on 28 December 2020).
68. Elorduy, P. El Sindicato de Inquilinos Considera "Obsceno" Que el Decreto de Desahucios Compense a Los Especuladores. *El Salto*, 22 December 2020. Available online: www.elsaltodiario.com/vivienda/sindicato-inquilinos-considera-obsceno-decreto-desahucios-compense-especuladores(accessed on 28 December 2020).
69. Valls, F. El Gobierno Compensará el Impago por Desahucio con la Renta Media de la Zona. *La Información*, 17 December 2020. Available online: www.lainformacion.com/espana/desahucios-prohibicion-gobierno-decreto-compensacion-viviendas-alquiler/2824117/(accessed on 28 December 2020).
70. Salvatierra, J. El Comercio Teme una Avalancha de Cierres. *El País*, 12 July 2020. Available online: https://elpais.com/economia/2020-07-11/el-comercio-teme-una-avalancha-de-cierres.html(accessed on 28 December 2020).
71. La Vanguardia. Los Comerciantes de Metro Piden a Ayuso que se Paralicen sus Desahucios. *La Vanguardia*, 16 November 2020. Available online: www.lavanguardia.com/vida/20201116/49488818100/los-comerciantes-de-metro-piden-a-ayuso-que-se-paralicen-sus-desahucios.html(accessed on 28 December 2020).
72. Cameselle, B. Así Vive el Pequeño Comercio la Crisis del Coronavirus: "El 15% no ha Vuelto a Abrir". *Cadena SER*, 13 September 2020. Available online: https://cadenaser.com/programa/2020/09/13/hora_14_fin_de_semana/1599997360_811131.html(accessed on 28 December 2020).
73. Salvatierrra, J. Las Rebajas no Alivian la Situación del Pequeño Comercio. *El País*, 7 July 2020. Available online: https://elpais.com/economia/2020-07-07/las-rebajas-no-alivian-la-situacion-del-pequeno-comercio.html(accessed on 28 December 2020).
74. Reuters Staff. Spain Moves to Slash Rents for Struggling Bars and Restaurants. *Reuters*, 22 December 2020. Available online: www.reuters.com/article/us-health-coronavirus-spain-idUSKBN28W1RD(accessed on 28 December 2020).
75. Sindicato de Llogateres. Las Claves del Decreto que Aplaza los Desahucios y los Cortes de Suministros. *Sindicato de Llogateres*, 22 December 2020. Available online: https://sindicatdellogateres.org/es/aplazan-desahucios-pero-rescatan-a-bancos-y-fondos-buitre/(accessed on 28 December 2020).
76. Blázquez, P. El Plan de Rescate a la Hostelería, Lejos de las Aspiraciones del Sector. *La Vanguardia*, 23 December 2020. Available online: www.lavanguardia.com/economia/20201223/6144069/plan-rescate-hosteleria-lejos-aspiraciones-sector.html(accessed on 28 December 2020).
77. El Periódico. El Gobierno Aprueba el Plan de Rescate al Turismo y a la Hostelería Sin Ayudas Directas. *El Periódico*, 22 December 2020. Available online: www.elperiodico.com/es/economia/20201222/gobierno-aprueba-medidas-hosteleria-comercio-turismo-11417178(accessed on 28 December 2020).
78. Blakely, G. *The Corona Crash. How the Pandemic Will Change Capitalism*; Verso: London, UK, 2020.
79. Lee, P. Private Equity can be the Big Winner from COVID-19 Sell-Off. *Euromoney*, 2 April 2020. Available online: www.euromoney.com/article/b1l0r609mm870v/private-equity-can-be-the-big-winner-from-covid-19-sell-off(accessed on 28 December 2020).
80. Elorduy, P. Amazon, Blackstone y BlackRock, los Grandes Beneficiados en la Economía Tras el COVID-19. *El Salto*, 21 April 2020. Available online: www.elsaltodiario.com/crisis-economica/amazon-blackstone-blackrock-crisis-oportunidad-acumulacion-poder-economico(accessed on 28 December 2020).
81. Rodríguez, E.; del Castillo, A.; Losada, V.; Ruiz-Giménez, J.L. Los Fondos Buitre Siguen Planeando Sobre la Pandemia. *El Salto*, 27 November 2020. Available online: www.elsaltodiario.com/fondos-buitre/los-fondos-buitre-siguen-planeando-sobre-la-pandemia(accessed on 28 December 2020).
82. Arroyo, R. Los Fondos, Listos Para la Oleada de Venta de Ladrillo de la Banca. *Expansión*, 3 December 2020. Available online: www.expansion.com/empresas/inmobiliario/2020/12/03/5fc7fc97e5fdeaee228b4726.html(accessed on 28 December 2020).
83. Sokol, M.; Pataccini, L. Winners and Losers in Coronavirus Times: Financialisation, Financial Chains and Emerging Economic Geographies of the COVID-19 Pandemic. *Mag. Econ. Soc. Geogr.* **2020**, *111*, 401–415.
84. Laudette, C.-L.; Landauro, I. Big Investors Sniff Bargains in Tottering Spanish Property Market. *Reuters*, 28 May 2020. Available online: https://de.reuters.com/article/us-health-coronavirus-spain-real-estate/big-investors-sniff-bargains-in-tottering-spanish-property-market-idUSKBN2342OP(accessed on 28 December 2020).
85. Sidders, J.; Robertson, B. Blackstone Raises $10.7 Billion for European Property Fund. *Bloomberg*, 8 April 2020. Available online: www.bloomberg.com/news/articles/2020-04-08/blackstone-raises-10-7-billion-for-european-real-estate-fund(accessed on 28 December 2020).
86. Durán, Y. Blackstone, a Por Todas en España, Tras Superar Los 24.000 Millones de Inversion. *Brainsre News*, 4 August 2020. Available online: https://brainsre.news/blackstone-a-por-todas-en-espana-con-24-000-millones-de-inversion/(accessed on 28 December 2020).
87. Alexandri, G.; Janoschka, M. 'Post-pandemic' transnational gentrifications: A critical outlook. *Urban Stud.* **2020**, *57*, 3202–3214. [CrossRef]
88. Sokol, M. Financialisation, financial chains and uneven geographical development: Towards a research agenda. *Res. Int. Bus. Financ.* **2017**, *39*, 678–685. [CrossRef]
89. Aalbers, M.B. The Variegated Financialization of Housing. *Int. J. Urban Reg. Res.* **2017**, *41*, 542–554. [CrossRef]
90. Harvey, F.; Kwan, M.-P.; Pavloskaya, M. Introduction: Critical GIS. *Cartogr. Int. J. Geogr. Inf. Geovis.* **2005**, *40*, 1–4. [CrossRef]
91. O'Sullivan, D. Geographical information science: Critical GIS. *Prog. Hum. Geogr.* **2006**, *30*, 783–791. [CrossRef]

92. Thatcher, J.; Bergmann, L.; Ricker, B.; Rose-Redwood, R.; O'Sullivan, D.; Barnes, T.J.; Barnesmoore, L.R.; Beltz Imaoka, L.; Burns, R.; Cinnamon, J.; et al. Revisiting critical GIS. *J. Econ. Geogr.* **2016**, *48*, 815–824. [CrossRef]
93. Hodkinson, S.; Essen, C. Grounding accumulation by dispossession in everyday life: The unjust geographies of urban regeneration under the private finance initiative. *Int. J. Law Built Environ.* **2015**, *7*, 72–91. [CrossRef]
94. Bittner, C.; Michel, B. Qualitative Geographische Informationssysteme. In *Sozialraum Erforschen: Qualitative Methoden in der Geographie*; Wintzer, J., Ed.; Springer: Berlin/Heidelberg, Germany, 2018; pp. 151–166.
95. Knigge, L.; Cope, M. Grounded Visualization and Scale. A Recursive Analysis of Community Spaces. In *Qualitative GIS: A Mixed Methods Approach*; Cope, M., Elwood, S., Eds.; SAGE: Los Angeles, CA, USA, 2009; pp. 97–114.
96. López, I.; Rodríguez, E. The Spanish Model. *New Left Rev.* **2011**, *69*, 5–29. Available online: https://newleftreview.org/issues/ii69/articles/isidro-lopez-emmanuel-rodriguez-the-spanish-model (accessed on 28 December 2020).
97. Rodríguez-Brito, W.; Martín, V.O.M. El Sur-Suroeste de Tenerife. In *Geografía de Canarias*; Morales Matos, G., Ed.; Prensa Iberica: Madrid, Spain, 1993; pp. 905–1820.
98. García-Herrera, L.M. Economic Development and Spatial Configuration in the Canary Islands: The role of cities in a peripheral and dependent area. *Antipode* **1987**, *19*, 25–39. [CrossRef]
99. Martín, V.O.M. *El Turismo en el Sur de Tenerife. De la Renta Agraria a la Renta de Ocio*; Cabildo de Gran Canaria, Cabildo de Tenerife: Santa Cruz de Tenerife, Spain, 2000.
100. Yrigoy, I. The production of tourist spaces as a spatial fix. *Tour. Geogr.* **2014**, *16*, 636–652. [CrossRef]
101. Martín, V.O.M. De la agricultura al turismo: La génesis del espacio turístico en el Sur de Tenerife. *Rev. Basa* **2005**, *28*, 44–49.
102. Martín, V.O.M. Tenerife: Coyuntura económica y transformación espacial en una isla turística. *Cuad. Tur.* **1999**, *3*, 69–91.
103. Acosta, C.R.D.; Rodríguez, M.D.C.D. Educación y empleo en Canarias. Situación y estrategias para el cambio económico. *BLOQUE X Educ. Form. Act. Econ.* **2010**, *2*, 1473–1506.
104. Colau, A.; Alemany, A. 2007–2012: Retrospectiva Sobre Desahucios y Ejecuciones Hipotecarias en España, Estadísticas Oficiales e Indicadores. *PAH*, 2013. Available online: https://afectadosporlahipoteca.com//wp-content/uploads/2013/02/RETROSPECTIVA-SOBRE-DESAHUCIOS-Y-EJECUCIONES-HIPOTECARIAS-EN-ESPA%C3%91A-COLAUALEMANY1.pdf(accessed on 28 December 2020).
105. Sánchez, R.; Ordaz, A.; Álvarez, P.J. MAPA | Así Colonizan las Principales Ciudades y Zonas Turísticas Españolas los Grandes "Caseros" de Airbnb. *elDiario*, 27 August 2018. Available online: www.eldiario.es/economia/propietarios-especializadas-gestionan-alojamientos-Airbnb_0_806669806.html(accessed on 28 December 2020).
106. González, D.; Antonio, G.; Pyzh, S. Análisis de las Viviendas Vacacionales en la localidad de Los Cristianos, Arona. Bachelor's Thesis, Universidad de La Laguna, Tenerife, Spain, 2018. Available online: https://riull.ull.es/xmlui/handle/915/12337 (accessed on 28 December 2020).
107. Pareja Eastaway, M.; Varo, I.S.M. The Tenure Imbalance in Spain: The Need for Social Housing Policy. *Urban Stud.* **2002**, *39*, 283–295. [CrossRef]
108. Miró, S.V.; Rullan, O.; Pérez, J.M.G. Consecuencias sociales del modelo económico basado en el crédito. Geografía de las ejecuciones hipotecarias en Menorca. *Scr. Nova. Rev. Electron. J. Geogr. Soc. Sci.* **2017**, *21*. [CrossRef]
109. Lillo-Bañuls, A.; Casado-Díaz, J.M. Individual Returns to Education in the Spanish Tourism Sector during the Economic Crisis. *Tour. Econ.* **2012**, *18*, 1229–1249. [CrossRef]
110. Castellano, J.M.P.; Mujica, J.D.; Medina, C.M. Real estate dispossession, income and immigration in Las Palmas de Gran Canaria (Spain). *Bull. Assoc. Span. Geogr.* **2020**, *87*. [CrossRef]
111. Woetzel, J.; Ram, S.; Mischke, J.; Garemo, N.; Sankhe, S. *A Blueprint for Addressing the Global Affordable Housing Challenge*; McKinsey Global Institute: New York, NY, USA, 2014; Available online: www.mckinsey.com/~{}/media/McKinsey/Featured%20Insights/Urbanization/Tackling%20the%20worlds%20affordable%20housing%20challenge/MGI_Affordable_housing_Full%20Report_October%202014.pdf (accessed on 28 December 2020).
112. Gonzaléz Cabrera, I. ¿La necesaria regulación "ad hoc" de las viviendas vacacionales? El caso de Canarias. *RIDETUR* **2018**, *2*, 23–54. [CrossRef]
113. García-Lamarca, M. From Occupying Plazas to Recuperating Housing: Insurgent Practices in Spain. *Int. J. Urban Reg. Res.* **2017**, *41*, 37–53. [CrossRef]
114. Armas-Díaz, A.; Sabaté-Bel, F. Struggles on the Port of Granadilla: Defending the right to nature. *Territ. Politics Gov.* **2020**, 1–21. [CrossRef]
115. Thurber, A.; Collins, L.; Greer, M.; McKnight, D.; Thompson, D. Resident experts: The potential of critical Participatory Action Research to inform public housing research and practice. *Action Res.* **2018**, *18*, 414–432. [CrossRef]
116. Mansilla, J.A. *La Pandemia de la Desigualdad. Una Antropología Desde el Confinamiento*; EdicionsBellatera: Barcelona, Spain, 2020.
117. Dougherty, C.; Eligon, J. Protesting without Gathering, Tenant Organizers Get Creative: Making the Rent has Gotten Harder. So Have Conventional Demonstrations. Housing Activists are Trying to Raise Their Voices despite Social Distancing. *New York Times*, 23 April 2020. Available online: www.nytimes.com/2020/04/23/business/economy/coronavirus-tenants-rent-protests.html(accessed on 29 December 2020).

MDPI
St. Alban-Anlage 66
4052 Basel
Switzerland
Tel. +41 61 683 77 34
Fax +41 61 302 89 18
www.mdpi.com

Urban Science Editorial Office
E-mail: urbansci@mdpi.com
www.mdpi.com/journal/urbansci

MDPI
St. Alban-Anlage 66
4052 Basel
Switzerland

Tel: +41 61 683 77 34
Fax: +41 61 302 89 18

www.mdpi.com

ISBN 978-3-0365-2829-8