EXPANDED ABSTRACT

Local social capital and its determinants: evidence from Catalonia

Purpose

Since it gained popularity in the late 20th century, social capital has been widely studied for its key role in bonding societies while generating socially desirable outcomes, such as economic growth and development, political participation, innovation and entrepreneurship. Social capital levels and its determinants have generally been studied either individually or at a regional or national level, leaving the local level with little empirical evidence. In this regard, this paper aims to provide an overview of both the determinants and levels of social capital, as well as the patterns of their geographical distribution at the municipality and county level in the Catalonia region.

Specifically, three main hypotheses are considered in this study: 1. Local social capital in Catalonia has observable determinants. 2. The patterns described in similar empirical evidence for other territories regarding the determinants and distribution of local social capital are also present in the case of Catalonia. 3. Social capital is unequally distributed throughout the region.

Approach

The two main sources of conflict when studying social capital arise when dealing with its definition and its measurement, which has prevented the concept from gaining more importance. While some argue that it should not be called capital or that it is a community feature, the economic approach assumes that social capital is a feature of the individual. Regarding its measurement, survey data and proxies are the two main approaches followed in research.

This paper follows the individual approach of economics, which allows for econometric modelling, using data on three indirect measures of social capital: average turnout in recent local, regional and Spanish general elections, associational density and average blood donations. Catalan municipalities over 5,000 inhabitants and 41 counties were included in the data set, except the five biggest cities, which experience too much variation in neighbourhood characteristics to be considered single entities and are therefore excluded from the analysis.

Following the methodology of Becker (1965) and Rupasingha et al. (2006) regarding household allocation of time and social capital formation, the model assumes that the representative household of a municipality or county can invest in two items: composite consumption, which is a function of market goods and time devoted to their production, and social capital, a function of household social

capital goods, the time allocated to their production, the household's own characteristics and the characteristics of other households. Investment in composite consumption implies the production of goods and activities, while social capital can produce observable social capital in the shape of associational density, election turnout or blood donations. The share of investment in each will depend on income restrictions, as well as on the amount of time available in each household and the prices of both market and social capital goods.

This framework allows for performing ordinary least squares regressions, and the annual series of the data on blood donations allows for a panel data analysis of seven consecutive years. Further, adding independent and control variables to the model allows for the observation of social capital determinants. Specifically, data on the prevalence of immigrants, elderly people and highly educated citizens in the municipality and county were included in the study. The income, population size, population density, percentage of home ownership, altitude of the municipality and a measure of geographical mobility, which was calculated using the proportion of people moving in and out of the city and county every year, respectively, were also considered. The sources of data were the Statistical Institute of Catalonia, the Government of Catalonia, the Catalan Blood and Tissue Bank and the Spanish National Statistics Institute.

Findings

The results show a negative relationship between the percentage of owned homes and social capital in the municipalities, although the theory suggests that owning a home increases the roots of the household in the area and so does social capital. However, other evidence has also encountered this counterintuitive result. Similarly, geographical mobility negatively affects election turnout and blood donations, especially in municipalities, in line with the evidence and the theories linking residential stability with the creation of stronger social networks. The percentage of immigrants is associated with smaller political participation, which is coherent with their limitations in voting rights. Other variables do not show any clear effect on social capital outcomes, such as income, which is predicted to have a positive coefficient.

Education has a limited and mostly positive effect, but it is far from the magnitude observed in the empirical evidence, which regards it as a key determinant of social capital. The proportion of elderly population seems to encourage the creation of associations and to discourage both blood donations, which in Catalonia are limited to people under 70, and turnout, which is counterintuitive since voting rates are traditionally high among older adults. The density of associations is clearly linked to higher turnout and blood donations. Altitude positively affects this density, so municipalities in mountainous areas tend to have more associations, while greater population density is related to less associational density and blood donations.

In addition, an index to summarise the levels of social capital was created by performing a principal component analysis using the three social capital proxies. The highest levels were found to be located in inland municipalities under 30,000 inhabitants, with few exceptions. Eight of the nine municipalities

with the lowest values belong to the Barcelona province, with five in its metropolitan area, validating the idea that commuter cities have low levels of social capital. Coastal cities are also affected by this phenomenon, perhaps due to the seasonal character of housing. Regarding the highest concentrations of social capital, they were mostly found in municipalities located in the provinces of Girona and Lleida, in eastern and western Catalonia, which are sparsely populated.

The distribution of social capital in counties shows high levels in western counties and in the western part of the Girona province, while counties with access to the sea are generally poor in social capital. The main common characteristic of those areas is the predominance of sparsely populated towns with a few hundred inhabitants, since among the five counties with the highest values only the city of Ripoll contains more than 5,000 inhabitants and is therefore included in the study of the municipalities.

Limitations

The results of this study were subject to a number of limitations. The main issue has been the general lack of statistical data for municipalities under 5,000 inhabitants and the limited availability of statistics at the municipality and county level. This impedes the complete visualisation of the data, as well as the identification of causal impacts and the influence of age groups, family sizes, urban distributions, years of schooling and spending in health care and education on the outcomes. The suspected role that income inequality plays in social capital could not be checked due to the lack of recent data, while other data sources are only updated every decade.

Further research could analyse the production process of local social capital in Catalonia, its relationship with the life cycle and the characteristics of areas with high levels of social capital that could be useful for policy purposes. The use of other measuring scales for big cities, such as neighbourhoods, would be highly valuable.

The findings could gain precision when being able to use instrumental variables to find the causal impact, as well as when using the proportion of blood donations achieved in each campaign as a better measure of the intensity of blood donations. In addition, taking into account the role of geography and capital cities in each county would be highly relevant.

Practical Conclusions and Original Value

By studying three variables associated with social capital some of its main determinants have been identified in both municipalities and counties. Different outcomes in the county analysis were also observed in some cases. Some patterns go in line with the empirical evidence, so Catalonia is not an exception, but some differ, leaving room for future confirmation of those results.

A social capital index is useful to compare both municipalities and counties, despite the fact that most municipalities are too small to be in the study, showing a pattern that seems to harm coastal

areas and the Barcelona metropolitan area and to benefit counties with a high prevalence of sparsely populated small towns.

This paper does not solve the issue of indirect measurement of social capital, nor the controversy surrounding the concept, but it might shed light on the local characteristics of social capital in Catalonia and its future research and policy implications. This contribution tries to explain those local differences with an unclear origin which promote social cohesion, with valuable insights for local public policy in terms of promoting and sustaining social capital.

KEYWORDS: Social capital, voter turnout, association density, blood donations, residential mobility, municipalities, counties, Catalonia, Spain.

1. Introducción

La primera mención conocida del capital social se remonta a hace más de cien años en el campo de la pedagogía (Hanifan, 1916), pero el concepto se popularizó sobretodo durante los años ochenta dentro de la sociología, y a partir de Putnam (Putnam, 1993) hizo el salto a otras ciencias sociales como la economía, donde adquirió una importancia creciente en el campo institucional y del desarrollo de las comunidades. En cuanto a su definición no hay consensos establecidos, y difieren ampliamente según la disciplina (Adler & Kwon, 2002; Guiso, Sapienza, & Zingales, 2011).

Dentro de la rama que considera al capital social como las relaciones que un actor mantiene con actores externos destaca la obra de Pierre Bourdieu, que lo define como «la suma de recursos corrientes o virtuales que se acumulan en un individuo o grupo a través de la posesión de una red durable de relaciones mutuas y reconocimiento, más o menos institucionalizadas» (Bourdieu, 1986: 249). Según Bourdieu, el capital social es una propiedad individual y hace una interpretación negativa del uso que se le puede dar, ya que considera que está ligado al estrato social al cual se pertenece y a las clases bienestantes. Muestra al capital social como una herramienta que tienen las élites para asegurarse de que la gente inadecuada no pueda acceder a sus círculos excluyentes (Bourdieu, 1986). También relaciona el concepto con la economía pues, bajo ciertas condiciones, se puede transformar en capital económico y puede ser institucionalizado en forma de título nobiliario.

Dentro del sector de autores que se centran en el capital social como la estructura de relaciones entre actores dentro de una comunidad destacan James Coleman y Robert Putnam. El primero considera que el capital social se define por su función, y que consiste en un conjunto de entidades que tienen en común el hecho de disponer de algún tipo de estructura social y el hecho de facilitar ciertas