Norman Schofield · Gonzalo Caballero · Daniel Kselman *Editors*

Advances in Political Economy

Institutions, Modelling and Empirical Analysis

This book presents latest research in the field of Political Economy, dealing with the integration of economics and politics and the way institutions affect social decisions. The focus is on innovative topics such as an institutional analysis based on case studies; the influence of activists on political decisions; new techniques for analyzing elections, involving game theory and empirical methods.

Social Sciences / Political Science

ISBN 978-3-642-35238-6

9 783642 352386

▸ springer.com

Schofield · Caballero
Kselman *Eds.*

Advances in Political Economy

Norman Schofield
Gonzalo Caballero
Daniel Kselman *Editors*

Advances in Political Economy

Institutions, Modelling and Empirical Analysis

Springer

funds will appear included at the central level as it is the central government who decides upon this debt in Spain.[6] Figures referring to "all governments" are consolidated among subsectors, as it is done in National Accounts.

Therefore, to accomplish its purpose, the present chapter is organized as follows. Following introductory remarks, in Sect. 1 I briefly review some of these key general contributions to the topic being investigated in the present paper. In Sect. 2 an empirical analysis is conducted for the period 1996–2007 on the Spanish case using National Accounts multilevel public finance figures in order to show the evolution of sub-central as well as central debt before the world financial crash. In this section the paper emphasizes some singularities regarding key aspects of the multilevel organization of government that exists in Spain, including legal details in place over the period concerning the ability to incur in deficit and to issue debt by sub-central governments. In Sect. 3 the same is done as regards to the 2008–2011 period that followed the said financial crash. This section will show that Spain has experienced a considerable increase in public deficit and debt since 2007, mainly at the central level. It also points to the current economic recession and the initial counter-cyclical measures adopted by all governments, including the increase in public expenditure needed for bailouts in the financial sector, as key factors leading Spain to exceed during this second period the limits on public deficit settled in the European Stability and Growth Path. Section 4 concludes by emphasizing that economic conditions seem factors more relevant for explaining the evolution of central and sub-central debt in Spain than factors linked to political and fiscal decentralization arrangements. As stressed in Sects. 3 and 4, the above statement is not to claim that debt limits, as well as some other public sector regulatory details and behavioral political practices, are irrelevant. The chapter also leaves for future econometric research the task of assigning numbers to the relative magnitude in which each of these impact factors have influenced the evolution of debt at the different tiers of government.

2 What Are the Main Factors Influencing the Evolution of Sub-central Debt that Are Being Emphasized in the Literature?

Before examining what has happened with sub-central, as well as central, debt we need briefly investigate which are the main factors influencing this evolution that are often stressed in the literature. Rodden and others[7] have made outstanding contribu-

to mixed consortiums, to public-private partnerships, etc. When these organizations belong to the business sector their activities are not directly accounted as part of the "general government" activities (central-regional-local-social security funds) but indirectly following National Account rules.

[6]This is not the case regarding multilevel public finance statistics provided by the IMF. That is why the percentages that follow are not strictly comparable with IMF based percentages. The OECD databases do not provide desegregated figures for social security funds debt for all countries.

[7]See Rodden (2002), Rodden and Wibbels (2002), Rodden et al. (2003), Rodden (2006).

tions on these issues from a comparative institutional perspective. They have recurrently stressed that institutional details characterizing federal systems are key factors (not necessarily the only ones) for explaining differences in performance among federations. They consider these factors crucial in explaining why sub-central governments behave in a fiscally conservative manner in some countries while they rely on deficit financing in others thus generating unsustainable levels of debt. This means that institutional-legal arrangements, as well as informal social norms and values, matter in the economy as well as in the polity. The key question however is: which institutional arrangements are decisive in each situation if political, economic and social circumstances as well as participants differ so much from case to case?[8]

Political and fiscal decentralization per se does not necessarily weaken fiscal discipline of sub-central governments according to this strand of literature. A key aspect seems to be whether the institutional setting for multilevel government provides expectations for sub-central government leaders that there is a possibility to be bailed out, ceteris paribus. In those multi-tiered systems of government in which the commitment by central government to reject demands for bailout lack credibility, political agents at sub-central governments may have the incentive to overspend and incur greater deficits if they have unrestricted access to borrowing or borrowing limitations are not credibly enforced.[9]

The incentive may be particularly relevant if political agents controlling a sub-central government belong to a different political party or coalition than the party or coalition controlling the central parliament and executive. The said incentive usually results in strong efforts on the part of sub-central politicians to ensure re-election by finding local and regional opportunities for spending if external financial sources are available and no obligation to raising own taxes over regional constituents exists. This is also referred to as the common pool problem.[10] This bias may driven the behavior of all parties, lobby groups and the people in general in the region or state. The more you get for "the state-region" from the common pool, the better.

Using a sample of 43 countries over the period 1982–2000, Plekhanov and Singh (2006) point to similar aspects as key factors in many cases. These authors conclude that no single institutional arrangement seems superior under all circumstances for disciplining sub-central government spending. Specific institutional characteristics of the country, state or region, the existence of any bailout precedent, and the quality of fiscal reporting seem relevant factors for all these countries.

Among these arrangements, the effectiveness of debt and spending limits has received considerable attention too in the literature, as well as the balanced budget

[8]See North (2005) or Ostron (1990) and (2005).

[9]From a sample of 30 countries, Melo (2000) shows evidence indicating that intergovernmental fiscal relations are likely to result in a deficit bias in decentralized policy-making with soft budgets constrains.

[10]Besley and Coate (2003), Knight (2006, 2008), Inman and Rubinfeld (1997), Baqir (2002), or Baron and Ferejohn (2007, 2009) address these common tax-pool issues mainly referring to the USA Congress and Senate. All emphasize on how the incentives created by national financing of local public goods lead to individual congressmen or senators to try to expand own-district spending at the same time that they try to restrain aggregate spending.

rule. Studies made upon panel data do not show a sole conclusion as usual. However, in many occasions these limits seem to have lowered the spending rate of growth during the boom periods, particularly if limits are well defined technically and it is easy to detect non-compliance by independent management bodies. But this is not always the case, as with regards to the US states for example, several authors have detected no significant difference in expenditure or revenue growth between states with and without such limitations for several periods of time. Shadbegian (1996) uses panel data from the 1960s till the 1990s with such a conclusion. Kousser et al. (2008) investigates changes within a given state, not among states, following the adoption of such ceilings and again they find little impact over the subsequent years since.

Of course, sub-central governments with strict balanced budget rules or debt limits are less able to help central government in the attempt to implement countercyclical policies.[11] Though, again, many exceptions and particularities exist from country to country that have to be taken into account for an in depth analysis and sound assessment. It must not be forgotten that debt limits typically apply only to guaranteed debt, excluding debt issued by special public enterprises, as well as by some public commercial agencies that are out of the so called "general government" entities whose budgets are passed at all levels of government. Though this debt usually needs central authorization, it represents a way to evade the said ceiling rules if central government political leaders are likely to do so.

The consequences of economic cycles are also critical factors examined in the literature.[12] Recessions usually lead to deliberate countercyclical spending measures as a first reaction.[13] If we also consider impact on spending derived from the automatic increase in other expenditures and the negative impact on tax revenues that also results, there can be little doubt that recessions always produce a negative impact on public deficits and debt levels. Bloechliger et al. (2010a, 2010b) show that recessions often affect public investment more than current expenditures as the former is easier to curtail in the face of budget constraints, while current expenditures are politically more sensitive or mandated and, consequently, more difficult to be changed.[14] Poterba (1994), for example, showed how the economic downturns in US during the late 1980s significantly and negatively affected public deficits by the States. He also found that political factors seemed were relevant, particularly for explaining deficits adjustments in subsequent years. Adjustments were made faster when a single political party controls the governorship and the state house than when party control was divided.[15]

---

[11] See Levinson (1998), Fatás and Mihov (2006) and Rose (2006).

[12] Barro (1979) is a seminal, much cited, contribution on this line of research.

[13] Padoan (2009), for example, investigates the size and composition of the fiscal stimulus packages of the major economies that were implemented during 2008 in an attempt to cushion the decline on aggregate demand and growth that occurred as a result of the world financial crash.

[14] See also Wibbels and Rodden (2006).

[15] See also Allain-Dupré (2011).

Periods of economic growth just work on the opposite direction. On this line of research and based on the evolution registered in the Swiss cantons between 1984 and 2000, Freitag and Vatter (2008), for example, provide empirical results showing that in periods of economic growth multilevel organization of government has no relevant impact on debt. There are enough revenues for all governments to share. However, in phases of economic recession differences among Cantons as regards to political autonomy seem to affect the evolution of their debt. In these periods, suddenly spending needs appear greater than public incomes and Cantons enjoying greater political decentralization tend to implement more active budgetary policies than centralized Swiss cantons, then incurring in greater debt.

There must be no doubt that both organizational factors as well as factors linked to economic conditions are attracting the attention of scholars dealing with fiscal behavior by sub central governments. However, knowing the relative role played by specific formal and informal organizational details as compared to the role of the economic cycle in determining the level and change in debt burdens is not an easy task. Moreover, econometric exercises attempting to find the definitive factors that are valid are often contradicted or refuted with other similar attempts found in the published literature. The purpose of the present paper is quite different as indicated in the introductory section. This paper attempts to quantitatively investigate the evolution of sub-central, as well as central, public debt in Spain and see whether the turn in economic conditions is paralleled by a similar turn regarding the evolution of debt. For accomplishing this research purpose, the next section focuses on statistics for the 1996–2007 period.

3 The Evolution of Sub-central and Central Debt in Spain Before the World Financial Crash

As Spain experienced major changes in developing a new quasi-federal political system from 1978 to 1983, it seems a suitable case study for investigating whether this political and fiscal decentralization drive was paralleled by a negative evolution of public debt at sub-central levels of government. How has public debt evolved in Spain? Did the world financial crash and the sever recession initiated in 2008 cause any significant turning point as regards to sub-central or central public debt?

It is evident that public deficits and outstanding public debt were reduced at all levels of government in Spain over the 2000–2007 period here considered if properly measured as a percentage of GDP, as Table 1 reveals. Contrary to the case in some Latin-American countries for example,[16] no relevant macroeconomic distortion has been generated and no bailout problem has existed over the period. Moreover, Table 1 also shows that both regional and local governments have contributed to the total outstanding debt in very low proportion over the period. Roughly speaking,

[16]See Tanzi (2000) for an analysis of the potential macroeconomic problems. For an analysis of the bailout problem in the Argentina case, see Jones et al. (2000), Sanguinetti and Tomassi (2004) Tommasi et al. (2001) or Saiegh and Tommasi (1999).

Table 1 General government debt in Spain before the world financial crash broken down by levels (% of GDP and Millions of Euros. National Accounts). Source: OECD, Eurostat and Bank of Spain. Figures in the public domain

	2000	2004	2006	2007
Sub-central Governments	9.6	9.1	8.7	8.5
Regional Governments	6.3	6.2	5.9	5.7
Local Governments	3.3	2.9	2.8	2.8
Central Government	51.5	37.1	31.0	27.7
ALL GOVERNMENTS in Spain	61.1	46.2	39.7	36.1
EU AVERAGE (Euro zone)	69.9	69.8	68.5	66.3
Sub-central Govs Debt in Millions Euros	59267	76148	86639	90424
Central Gov Debt in Millions Euros	314766	312994	304416	291883
Sub-Central Govs Debt as % of Total Debt	15.84	19.56	22.15	23.65

the central government contributed about three times more than regional and local governments did to outstanding debt. Since the mid 1990s, outstanding debt by the regional governments has remained around 6 per cent of Spanish GDP and that one by local ones around 3 per cent. Total outstanding debt in Spain has always been lower than the EU average level over the period prior to the current financial crash, as Table 1 also indicates.

Graphically, this evolution of public debt broken down by levels of government can be observed in Fig. 1.[17] If we take into consideration that over those years, the process of political decentralization was very intense,[18] it can be stated that this political decentralization was not paralleled by any relevant fiscal or debt problem at sub-central or central levels of government. A different issue to be addressed in the next section is if this new multilevel political system will be able to effectively respond to the fiscal consolidation strategies required after the world financial crash.

Several explanations may help point towards what occurred in Spain during this period. It is well-known that, along the past two decades, many developed countries have significantly changed the context in which their fiscal policies operate, particularly by adopting fiscal rules containing explicit limits to the public deficit and/or the outstanding public debt. In some cases, explicit top ceiling to annual total expenditures have also been settled. If compared with countries where these fiscal rules are absent or not fully endorsed, the empirical evidence taken from the former ones

[17] All figures are made according to the European excessive-deficit protocol. Debt issued by Social Security Funds is included at the central level of government.

[18] Three years after the approval of the 1978 democratic Constitution, regional governments only managed 2.9 percent of total public expenditures. In 2006 they managed 33.1 percent. If we also take into account that total public expenditure in Spain has experienced a significant and rapid growth over those years (from 24.9 per cent of Spanish GDP in 1974 to about 40 percent on average over the 2000s.

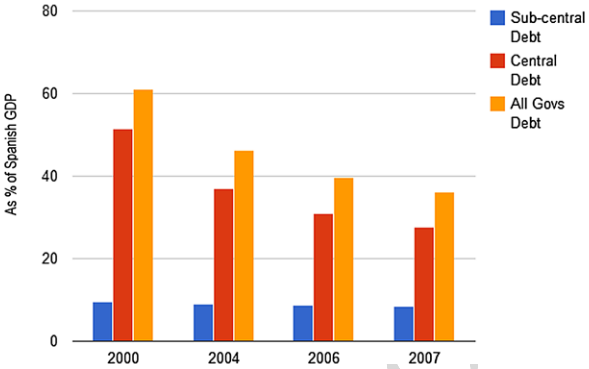

Fig. 1 General government debt in Spain before the world financial crash broken down by levels (% of the GDP and Millions of Euros. National Accounts). Source: Eurostat and Bank of Spain. Figures in the public domain

tend to show these rules as useful mechanisms in helping to maintain budgetary discipline, but mainly during periods with enough economic growth.[19] However, the specific design of limitations and controls greatly determines the effectiveness of these rules. Monitoring and enforcement aspects or the specific procedures settled for dealing with potential deviations seem also crucial aspects.

Moreover, some central legal rules for borrowing have always existed since democratic transition.[20] Therefore, they may have played a role in maintaining the fiscal discipline displayed by regional as well as by local governments over the period. However, these legal rules have not been sufficient controls once the financial crash and its associated economic recession started. Thought an increase in public debt measured in millions Euros was registered over the boom period, this did not cause any increase in the relative percentage of sub central debt in terms of GDP, which is the most relevant economic comparison. Controls and the economic cycle seemed to act to restrain relative debt burdens across levels of government.

Though these rules and controls have also been changed on several occasions, a written approval of the Central Finance Minister has always been required for regional governments to access long term credit and issue debt, and specific constraints and requirements were settled by Law for obtaining such a written authorization.[21] In particular, for regional governments to get long term credit (longer than a year), two requirement have always been in place. First, all credit must be dedicated to investment. And second, annual repayment (capital and interests) must not be higher than 25 % of each regional government annual current income. As regarding the legal rules framing financial sources at local governments' disposition, two Laws were passed in the Central Parliament since the very beginning of

[19]See Debrun and Kumar (2008).

[20]These Law initially passed in the central parliament were: Organic Law 8/1980 on Regional Governments Finances, Law 7/1985 and Law 38/1988 on local public finances. These laws have been reformed in several occasions since.

[21]In 2001, borrowing activities by Regional governments were also linked to the balanced budget principle, though some flexibility was introduced in the application of this principle in 2006, and latter on in 2009.

democratic transition, once the 1978 Constitution was in effect. These two initial legislation packages were Law 7/1985 and Law 38/1988. The second is known as the Regulatory Law of Local Public Finances (*Ley Reguladora de las Haciendas Locales—LRHL*). Several reforms have taken place since those years.[22] As a result of all these regulatory packages, local governments have been subject to similar obligations in regards to budgetary stability as those affecting regional governments, though some flexibility and exceptions are explicitly considered in case of recessions in such legislative measures. Plans to progressively eliminate public deficit deviations are also required. In all cases, authorizations to access credit and issue short term and long term debt may be denied by the Central Finance Minister if these plans are not fully implemented.[23]

Moreover, it seems evident that the spectacular increase registered in total public income on average over the growth period (both in total euros and as a percentage of GDP), did also help in reducing public deficits and, consequently, the outstanding public debt levels as shown in previous Table 1. An increasing amount of public income has been available for financing public policies at all levels of government. Attention must be paid to the fact that over this period, the Spanish GDP also grew significantly. The economic growth registered over the period provided regional governments with an increasing amount of financial resources. Most of this public income has come from the increase registered in the Spanish tax revenue in relation to GDP: an increase of about eighteen points in about thirty years (from 18.4 per cent of GDP in 1975 to 36.7 in 2006 according to the ministry of finance figures). Moreover, Spain has also been receiving, until 2001, on average about 1–1.2 percent of GDP more each year in net terms as public income from the European Union.[24] The economic cycle seems a key issue as we are going to emphasize in the next section. Therefore, the figures provided show that the significant drive to political federalism and fiscal decentralization has not been paralleled by a non-disciplined fiscal behavior on the part of sub-central governments over the period that ended in 2007. Sub-central debt levels were reduced significantly in percentage of GDP, as OECD figures show. Sub-central public deficit also went from −0.6 percent of GDP in 1996 to −0.4 in 2006.

[22] Two of these significant reforms regarding borrowing issues were implemented through Royal Decree 1463/2007 (which further develops basic principles settled in the General Law for Budgetary Stability already mentioned) and Royal Decree Law 5/2009 (which contained urgent and extraordinary measures to facilitate local governments to pay their providers if some obligations remained unpaid in 2008. Local government have had three months after the approval of the 2009 Royal Decree Law for documenting these obligations that could not be paid and exceptionally apply for extra credit authorizations that will have to be repaid in six years maximum, that is in 2013).

[23] An extra requirement exists for local governments to freely access short term credit (repaid along the year): the total amount obtained must not exceed 30 percent of current incomes in the previous year.

[24] Since 2002, this source of income is becoming less significant in terms of GDP, and has suffered a further reduction for the period 2007–2014 as the twelve new countries that entered the EU in 2004 and 2007 are obtaining most of the EU funds for the new period.

4 What Has Happened with Sub-central, as well as, Central Debt in Spain After the World Financial Crash?

The above analysis does not mean that the singularities regarding political and fiscal decentralization arrangements are irrelevant. However, after more than a decade leading up to a major financial bubble in developed countries, some dramatic events erupted around the fall of 2008. The severity of the economic recession generated and the initial counter-cyclical measures adopted by all governments, together with some other singular national factors, has lead to all European countries, in particular, to double or triplicate the public deficit levels they registered prior to the financial crash, then exceeding the limits established in the European Stability and Growth Pact (ESGP). Several other measures that are being taking necessarily imply more public spending as is the case of the financial sector reform and those measures implemented to reorganize and recapitalize banks and savings banks, with several banks already bailed-out.

In countries that were not able to significantly diminish public deficits and debt over the boom, the consequences of recession, bankruptcies and bailouts in the financial sector, to mention but a few events, have been more severe in terms of public deficit and debt. This has caused considerable uncertainty on the part of international investors over the ability of these governments to successfully issue new debt at reasonable interest rates and even to pay back bonds previously issued.

But this evolution of debt levels alone does not explain why Spain has experienced such a critical situation, particularly since the beginning of 2010. Japan, for example, has got a debt burden of near 200 per cent of GDP and has had no similar financial problems at international markets. Key issues in the case of Spain are the bad record regarding economic growth since 2008, the bubble in the building sector that has finally burst and seriously affected banks and saving banks, and also the many needs regarding current and expected levels of elderly populations having the right to get a public pension. The situation looks even worse if we consider the huge increase in unemployment that Fig. 2 shows. This reveals not only that internal demand has dropped and more and more public expenditures are needed, but also that no dynamic export sector has come as a substitute. As a result, a spectacular decrease in public revenue is taking place at all tiers of government. Regarding the balance of payments, the current account external trade deficit that Spain is registering, according to OECD figures (with no compensation from the financial account) transmit the idea to international investor that problems will not be solved in the near future. As higher is external debt (not just public external debt, but also external debt by households, enterprises and banks) the worse regarding expectations.

The importance of having or the lack thereof of effective fiscal rules and public deficit and debt controls increases, of course, in the case of countries belonging to monetary unions, as is the case of Spain. As the Euro zone case reveals since early 2010, the sharp increase in public debt registered in some countries is clearly producing significant negative impacts on other partners in the zone. This, in fact, was a main argument for introducing the well-known public deficit and debt top limits into the European Union Treaty at late 1980s. These shared consequences have also

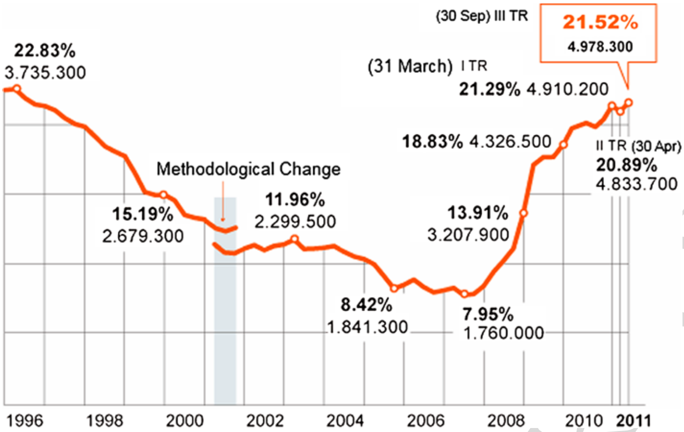

Fig. 2 Unemployment in Spain (percentage of active population and number of people unemployed). Source: Figures in the public domain from the Spanish National Institute of Statistics that are fully consistent with those provided by the OECD

lead to the several amendments of the already mentioned European Stability and Growth Pact (ESGP) that have taken place. They have finally been used also for justifying interventions or bailouts (Greece, Ireland, Portugal, and the bailout plan for the saving banks in Spain).

In all these countries, the extremely critical economic situation created since 2008, together with the particularities of the specific economic problems affecting each country, has resulted in spectacular increases in outstanding public debt levels in just four years. In the case of Spain, the total public debt has doubled in terms of the Spanish GDP if 2011 and 2007 years are compared, as Table 2 shows (from 36.1 per cent of GDP to 72.1 per cent). Sub-central governments' debt has also experienced a significant increase with about 68 thousand millions euros added to the stock of Spanish public debt in just four years, with regional governments as main contributors. However it has been at the central level of government where the drastic turning point in economic cycles that took place in 2008 has caused the greatest impact. Outstanding central public debt soared from 27.7 per cent of Spanish GDP in 2007 to 52.1 per cent in 2001, adding more than 267 thousand millions Euros (about 334 billions US dollars) to the total outstanding public debt in Spain over the said four years.

Graphically, this evolution of debt by levels of government over the 2007–2010 period is shown in Fig. 3, which includes also previous years for comparative purposes.

There must be no surprise that Moody's, Fitch and S&P, though they are very much contested agencies as they gave AAA to Leman Brothers in 2006,[25] recurrently downgrade the ratings for central and sub-central government debt in Spain,

[25] As well as to, for example, the four banks rescued in Ireland, which amounted the annual public deficit in the country to more than 30 per cent of GDP. Remember that the European Stability and

Table 2 General government debt in Spain after the world financial crash broken down by levels (% of GDP and Millions of Euros. National Accounts). Source: OECD, Eurostat and Bank of Spain. Figures in the public domain

	2007	2008	2009	2010	2011
Sub-central Governments	8.5	9.6	12.0	14.8	16.4
Regional Governments	5.7	6.7	8.7	11.4	13.1
Local Governments	2.8	2.9	3.3	3.4	3.3
Central Government	27.7	30.6	41.9	46.4	52.1
ALL GOVERNMENTS in Spain	36.1	40.2	53.9	61.2	72.1
EU AVERAGE (Euro zone)	66.3	70.0	79.5	85.3	87.2
Sub-central Govs Debt in Millions Euros	90424	114400	125662	154891	175502
Central Gov Debt in Millions Euros	291883	322584	439420	488245	559459
Sub-Central Govs Debt as % of Total Debt	23.65	26.17	22.23	24.08	23.87

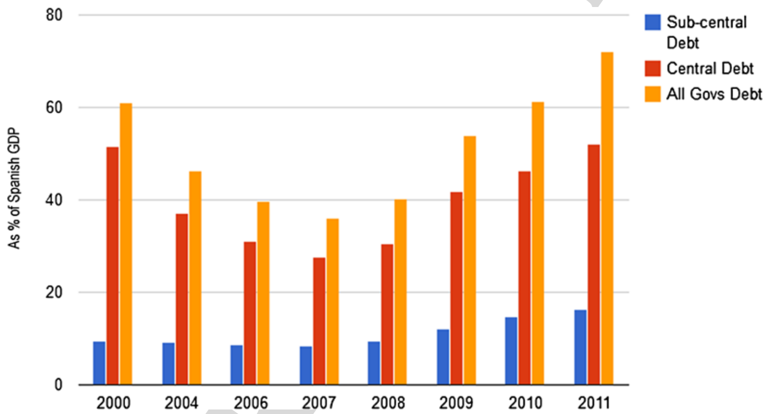

Fig. 3 General government debt in Spain before and after the world financial crash broken down by levels (% of the GDP). Source: Eurostat and Bank of Spain. Figures in the public domain

as well as in several other countries of course. Obviously, a main consequence of this downgrading is the increase in interest rates to be paid for issuing debt as downgrades imply greater estimated risk of default in repaying this debt, which negatively affects the purpose of reducing public deficits. There must be no surprise either that in the short term all austerity measures being implemented since 2010, particularly in several EU countries, represent contractive policy measures that have finally damaged the already weak economic recovery that seemed to have started at the last quarter of 2010, as Krugman and many other analysts recurrently called attention

Growth Pact required it to be under three per cent as a general rule, let aside the exceptions also settled.

to. With neither external demand nor internal consumption able to pull the Spanish economy and with all tiers of government cutting expenditures to reduce public deficits since 2010, it must be no surprise that the economy remains in contraction in 2011 and 2012, as preliminary figures already available reveal.

5 Concluding Remarks

Regarding the evolution of sub-central, as well as central, public debt in Spain over the period 2000–2011 the present investigation indicates that the impacts of economic conditions seem the key factors. The figures here provided show that a turning point took place in 2008 when the world financial crash started. This is not to say that the singularities regarding political and fiscal decentralization arrangements and public deficit and debt controls are irrelevant for the evolution of public debt. In fact, as the chapter stresses, it is a common ground in many published articles to state that if sub-central governments are left to their own devices and their borrowing activities are not centrally controlled, it is likely that these governments tend to borrow excessively as regards to the macroeconomic needs of the country, also entering the risk of default more easily than would be otherwise if strict regulations were settled and enforced, ceteris paribus.

In the Spanish case this undisciplined fiscal behavior has not taken place till 2007. The detailed formal limits on deficits and debt that have always existed have no doubt positively influenced this evolution of debt over the period, as mentioned in the chapter. The increase registered in tax revenue along the period played also a key role. As growth rates were higher in Spain than the EU average it is no surprise that debt levels in Spain experienced also greater reduction in terms of GDP till 2007, as the figures provided show. As regulations and controls regarding public deficits and debt were also in effect during 2008 and 2009, it seems straightforward that these regulations cannot be charged for the spectacular increase registered in public deficits and total debt after the world financial crash. Total public deficit in Spain reached (−) 4.5 per cent of GDP in 2008 and (−) 11.2 per cent in 2009, whereas in 2007 all governments had registered a surplus of (+) 1.9 per cent of GDP. And this has been also the case concerning many other European countries. The limits established in the European Stability and Growth Path could not be achieved by most EU countries. As regards to public debt, the chapter has stressed that in just four years total outstanding debt by all governments in Spain doubled (from 36.1 per cent in 2007 to 72.1 per cent in 2011). Therefore, it is evident that the extremely serious recession experienced since 2008 has been paralleled by a substantial increase in public deficits and debt levels in Spain even if no relevant change was introduced in the country regarding the basic rules characterizing political and fiscal decentralization as well as debt issuing controls.

Moreover, the analysis provided in the chapter also indicates that it has been at the central level of government where the debt has increased more in absolute terms since 2007, with 267 thousand millions euros (about 334 billions US dollars) being