

*Full Length Research Paper*

# Fiscal solidarity: Key benefits and pitfalls for Spain to lower their fiscal conflicts

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Accepted 18 June, 2009

On December 6<sup>th</sup>, 1978 the Spanish population implemented its new constitution by means of a referendum and finalised the transition process from the Franco regime to a modern democracy based on a parliamentary monarchy. In the next 30 years the fiscal power and the expenditure autonomy of the 17 regions, called *Comunidades autónomas*, increased constantly. But on the other hand, in some regions – mainly in the Catalan and the Basque regions – the demand for complete sovereignty has also become stronger, while the central government is currently unwilling to delegate any additional tax sovereignty to the regions. Therefore, this paper presents the German equalization system among the states and concludes with some policy implications to reduce the ill feelings between the central government and its respective regional counterparts in Spain.

**Key word:** Fiscal federalism, Spain, sub-national finance, Germany.

## INTRODUCTION

Spain can be considered as one of the classical examples of asymmetric fiscal decentralisation. The main reason for such a process is based on the political circumstances of the transformation from the Franco regime to a modern democracy based on a parliamentary monarchy. Furthermore, such an asymmetric fiscal decentralisation was the only option to guarantee the continuance of Spain as a whole nation and also allows all different regions a strong sense of nationality in the area of languages, culture, law and economic arbitration.

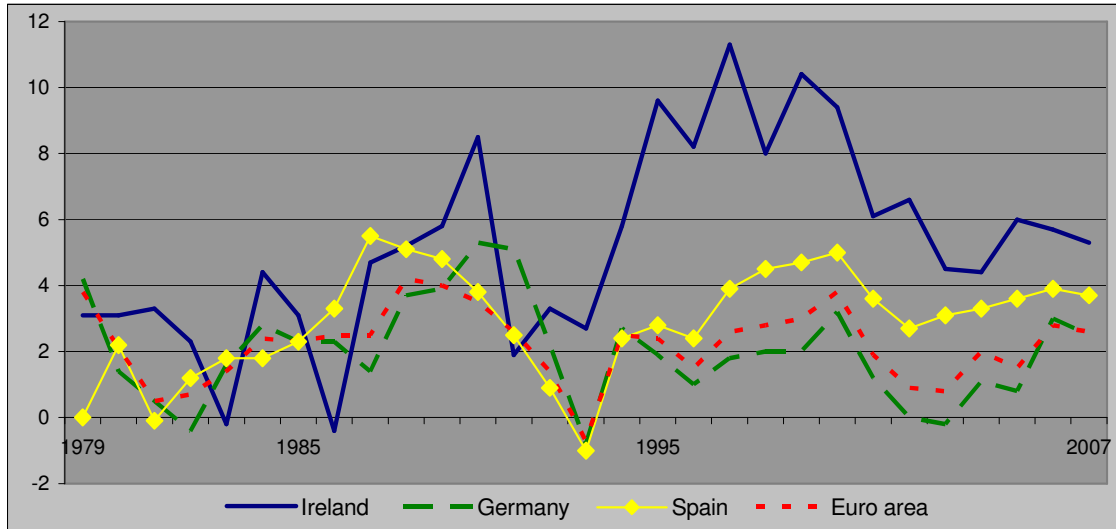
Another dimension, which has also lowered the danger of a further Spanish civil war like the war from 1936 until 1939, is the robust economic growth in the last three decades. Similar to the Irish economy, the Spanish economy has increased more strongly than other European countries and could be described as one of the success stories in the European Union. The following Figure 1 presents the real GDP of Germany, Ireland, Spain and € area from 1979 - 2007:

Spain is a federal state with a four-level administrative structure. In addition to the central government in Madrid, there are 17 regions (*comunidades autónomas*), 50 provinces (*provincias*) and 8,111 municipalities (*municipios*) in Spain. Moreover, Spain possesses also two enclaves in North Africa; the city of Ceuta and the city of Melilla (In 2005, Ceuta had a population of 71,374 and 67,102 people lived in Melilla). Both cities have the legal status of a region as well as that of a province and for this

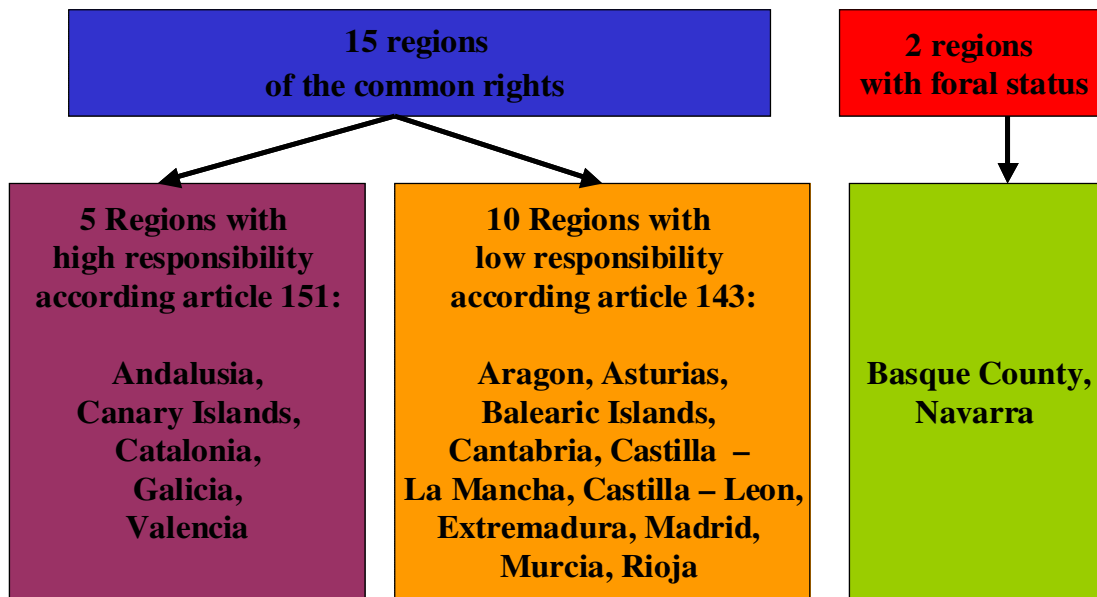
reason sometimes the number of provinces is reported to be 52.

The Spanish constitution of 1978 divided the regions into three different groups. The two Autonomous Communities of Navarre and the Basque county possess a special status called “foral” and therefore their independence from the central government in Madrid was extremely high, example, they had their own tax administration and huge tax sovereignty, which was quite similar to that of an independent state.

The residual 15 regions, which are called regions of the common rights (*Comunidades Autónomas de Régimen Común*), can be divided into two groups. During the beginning of the decentralisation process, five regions gained responsibility in major expenditure areas like health and education. Compared to the two “foral” regions, these five regions did not have their own tax administration and were financed at the beginning of the decentralisation process mainly by grants and later by sharing the most important taxes with the central government. The last group of ten regions played a more “passive role” when the central governments offered the decentralisation of expenditure, because the regions were mainly economically weak and preferred to place the burden of this cost-intensive expenditure on the central government. The following Figure 2 presents the exact distribution of the regions by the Spanish constitution.



**Figure 1.** Real GDP growth of Germany, Ireland, Spain and € area from 1979 until 2007 (Annual growth in percentage). Source: Own illustration based on various publication of EuroStat.



**Figure 2.** Constitutional classification of the Spanish regions. Source: Own illustration.

The 17 regions are heterogeneous and differ in population and size. The two smallest regions, Rioja and the Balearic Islands, have a surface area of only around 5,000 km<sup>2</sup>, while Andalusia and Castilla-Leon are 90,000 km<sup>2</sup> big. Rioja has a population of less than 300,000 people compared to more than 7.7 million inhabitants of Andalusia. The regions also vary in their economic potential, as can be observed in the following Table 1, but compared to other OECD countries the economic disparities between the Spanish regions are much lower.

To understand the Spanish intergovernmental system

and especially the strong demand for autonomy or even independence of some regions, it is necessary to be familiar with some historical facts. Spain as an independent nation was founded in the late 15<sup>th</sup> century, because the Kingdom of Castile and the Kingdom of Aragon, which besides Aragon also includes Catalonia, the Balearic Islands and Valencia, were merged by marriage, and together both Christian kingdoms beat the Moslem Moors from North Africa. During the Moslem dominance in Spain, the coastal area of Catalonia as well as the Basque county and Galicia were never completely

**Table 1.** Regional GDP per capita relative to Spain and the European Union (EU27).

	<b>GDP per capita, 2005</b>	<b>Relative to Spain, 2005, (Spain = 100)</b>	<b>Relative to the EU, 2006 (EU =100)</b>
<b>Foral</b>			
Basque County	€ 26,652	129	136
Navarra	€ 26,444	128	132
<b>Common rights</b>			
<b>High responsibility</b>			
Andalucia	€ 16,474	79	82
Canary Islands	€ 19,262	93	95
Catalonia	€ 25,091	121	124
Galicia	€ 17,129	83	88
Valencia	€ 19,535	94	96
<b>Low responsibility</b>			
Aragon	€ 22,400	108	112
Asturias	€ 18,321	88	94
Balearic Islands	€ 23,453	113	115
Cantabria	€ 20,614	99	104
Castilla - La Mancha	€ 16,796	81	83
Castilla - Leon	€ 19,738	95	100
City of Ceuta	€ 19,018	92	97
City of Melilla	€ 18,456	89	95
Extremadura	€ 14,179	68	71
Madrid	€ 27,494	133	136
Murcia	€ 18,065	87	89
Rioja	€ 22,608	109	111

Source: Own illustration based on various publications of the Instituto Nacional de Estadística.

controlled by the Moors and therefore the Moors allowed these areas a high level of independence. Moreover, the new Christian Kingdom of Spain also needed the support of a number of smaller kingdoms and counties, example, Catalonia itself was never an independent kingdom in its entire history – in order to beat the Moors, and as a “political counterpurchase” these smaller regions received a high level of independence again, which for the Basque county is known as the “foral rights”.

In the early 1700s the Kingdom of Castile was very powerful and won the “War of the Spanish Succession” and for this reason Madrid abolished all autonomy rights of Catalonia and the Balearic Islands by the so-called “*nueva plata*”. The supporters of a centralised Spain argue that since the Nueva Plata Act Catalonia has had no general autonomy for nearly three hundred years and in its whole history Catalonia has always been merely a county but not an independent kingdom. The supporters of an independent Catalonia underline the long historical roots of more than a millennium combined with its own language and interpret this as an indicator of an independent nation. However, the Catalan nationalists declaimed their sovereignty peacefully in the existing democratic system, while in the Basque country ETA, an organization fighting for Basque independence with bloody terror,

has existed since 1959. After the fall of the Franco regime, ETA itself split into a military wing and a political wing, which still proclaims the Basque independence but without using terror to reach its goal. The political wing of the 1978 diversification of ETA has mainly joined the national Social Democratic Party of Spain (PSOE), but ETA itself has also found some political parties to transfer its ideas to the regional parliament of the Basque county. As in the last two decades ETA also killed some innocent bystanders like children or very popular mayors who were members of the Conservative or the Social Democratic Parties, the majority of the Basque population does not sympathise with ETA. However, the same majority also asked for more autonomy or even an independent country for the Basque region.

Besides the Castilian language (Spanish), Galician, Catalan and Basque are the three additional official languages in Spain. All four languages are equitable and a cultural discrimination like during the Franco regime does not exist in Spain any more.

The following chapter two describes the administration structure as well of tax sharing between the three tiers of government in Germany, chapter three highlights the German equalisation among the 16 federal states and some policy implications are presented in chapter five.

**Table 2.** Tax revenues assignments between the central government, the federal states and the municipalities in 2007.

	Central Government	Federal States	Communities	Revenues in 2007
Consumption tax	100 %			€ 73.3 billion
Inheritance tax		100 %		€ 4.2 billion
Property tax			100 %	€ 10.7 billion
Personal income tax	42.5 %	42.5 %	15 %	€ 170.5 billion
Value added tax	54.5 %	43.5 %	2.0 %	€ 169.6 billion
Corporate income tax	50 %	50 %		€ 22.9 billion
Interest rebate	44 %	44 %	12 %	€ 11.1 billion
Trade tax	3.8%	12.9%	83.5 %	€ 40.1 billion

Source: Author.

## STRUCTURE OF GOVERNMENT AND REVENUE AND EXPENDITURE ASSIGNMENT IN GERMANY

Germany is a federal state with a three-level administrative structure. In addition to the federal government, whose ministries are based both in Germany's capital, Berlin, and in Germany's former capital, Bonn, there are 16 federal states (*Bundesländer*) (Three of the 16 federal states are city-states (Berlin, Bremen and Hamburg). These three federal states do not separate their municipal budgets from their respective federal budgets and thus only have a federal budget) plus a number of regional administrative bodies in Germany.

Within the local authorities in Germany, a further distinction is made between the regional planning associations (*regionale Planungsverbände*), the 313 rural districts (*Landkreise*), the 116 incorporated cities (*kreisfreie Städte*) and the 12,263 municipalities, which form part of the rural districts. The towns and municipalities, which after numerous territorial reforms in the respective federal states between 1970 and 1977 have become quite compact by now in terms of their inhabitant structures, are the smallest local units in Germany.

In Germany, tax revenues are distributed among the individual regional administrative bodies both according to own assigned revenues and revenues sharing. This, for example, means that the tax receipts from the real property tax are available to the municipalities in full, while they also receive a fixed percentage of the tax receipts from the value added tax (VAT) and the personal income tax (PIT). The distribution of the most important tax revenues is shown in Table 2.

The political accountability for the expenditure is not clearly defined in Germany. For example the level and criteria of the social welfare are fixed by the central government, but the disbursement of the grants and the examination of the respective social neediness is the responsibility of the local authorities. Moreover, the central government delegates a huge number of administrative duties – mainly in the area of social security - to the

federal states and the local authorities and bears the expenses of these delegations.

Table 3 shows the distribution of the accountability for some areas of expenditure between of different tiers of government.

The German fiscal equalisation among the federal states (*Länderfinanzausgleich*) is based on article 107 of the German constitution (*Grundgesetz*) and consists of several levels. The interstate equalisation system was first utilised in 1950 as a kind of compensation for “special burden” like for example of harbour maintenance. In 1955 these transfers received the constitutional basis by the creation of the said article 107. On the hand, article 107 determines that a portion of the VAT, owned by the states, have to use to support economically weak states as well as richer states have to distribute poorer states directly. On the other hand, the exact amount of these two instruments is not written down in article 107. In fact the constitutional article 107 only points out that the central government has to develop an equalisation law and this law needs in both houses of parliaments – the national parliament (*Bundestag*) as well as in the joint representation of state governments in the upper chamber (*Bundesrat*) – a majority. Therefore the states can influence by their behaviour in the *Bundesrat* the design of the equalisation systems directly.

Furthermore in Germany exists an intergovernmental forum to strengthen the political dialog between of all three tiers of government? The Financial Planning Council (*Finanzplanungsrat*) consists of the Federal Minister of Finance as chairman, all 16 State Minister of Finance and additionally 4 representatives of the local authorities, which were selected by the *Bundesrat*. More-over one representative of the German Federal bank (*Bundesbank*) takes part of the meetings of the Financial Planning Council as a constant adviser. The Financial Planning Councils meets twice a year and try to arrange a common budget policy of central government, states and local authorities as well as the observance of debt criteria of the Maastricht treatment about the common currency.

**Table 3.** Distribution of the accountability for some areas of expenditure.

	Central government	Federal states	Rural districts	Municipalities
Foreign policy	X			
Currency policy	X			
Defence policy	X			
Social welfare	X			
Roads, railways and inland water transportation	X	X	X	X
Education		X		
Police		X		
Construction Supervision			X	
Maintenance and new building of school facilities			X	
Public transportation			X	
Maintenance and new building of public hospitals			X	
Kindergarten				X
Fire department				X
Theatres and museums				X
Parks and sports facilities				X
Waste management				(X)
Electricity supply				(X)
Water supply				(X)

(X) = The majority of the municipalities arranged special purpose associations for this task. The purpose associations are owned and political controlled by the municipalities. A minority of municipalities have sold their special purpose associations to private companies, but they have concluded long-term arrangements with the private companies.

Source: Werner, 2006, page 119.

However, the Finical Planning Council does not dispose about executive power or instrument to punish the three different authorities and for that reason their critics called this institution a "toothless paper tiger". But some of these critics do not realize that the task and the em- placement of the Financial Planning Council are know- ingly not similar to the Australian Commonwealth Grants Commission (CGC) or the Indian Finance Commission. Rather the mainly business of the German Finical Plann- ing Council is to originate a forum for the political decision maker to solve the finical problems in the framework, which is described by Spahn and Franz as "Consensus Democracy and Interjurisdictional Fiscal Solidarity in Germany" (Spahn / Franz, 2002, page 122).

### FISCAL EQUALISATION AMONG GERMANY'S FEDERAL STATES

Fiscal equalisation can take place both vertically and horizontally. Fiscal equalisation among Germany's feder- al states (*Länderfinanzausgleich*, LFA) is largely charac- terised by horizontal allocations of funds between the federal states. There is also a vertical allocation of addi- tional funds by the central government.

Figure 3 illustrates the different approaches to interre- gional fiscal equalization. Australia has a strong, vertical

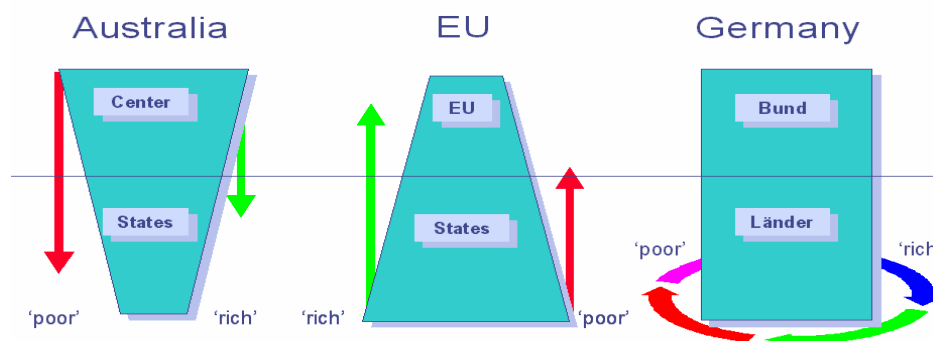
fiscal imbalance in favour of the central government. It corrects this imbalance by using asymmetric vertical grants (based on the goods and services tax) with an implicit equalizing effect (see Spahn and Shah 1995). The same is true for the European Union, but the direction of resource flows is upwards (A similar concept can be observed in Bosnia and Herzegovina; see Werner / Guihéry / Djukic, 2006), not downwards as in Australia. Germany uses a share of the VAT to establish vertical fiscal balance between the federal government and the states. From this position it organizes the horizontal redistribution of resources among states to achieve regional equalization.

### Make-up of Germany's fiscal equalisation up to 2005

Germany's fiscal equalisation among the federal states is based on article 107 of the German constitution and consists of several levels. Generally, the horizontal fiscal equalisation among the federal states can be classified as:

- i. The distribution of corporation tax and personal income tax.
- ii. The distribution of value added tax.
- iii. Fiscal equalisation among the federal states (narrow

## Approaches to regional equalization



**Figure 3.** Examples of fiscal equalisation among regional administrative bodies.  
Source: Spahn / Werner, 2007, page 97.

definition).

iv. The allocation of additional funds by the central government.

Generally, the fiscal authorities in the respective federal states are entitled to receive, in full, the tax revenues from the state own taxes and a share of both the income tax and the value added tax, according to the principle that taxes are collected in the place where they were generated.

The principle of tax collection where generated runs counter to the law of tax segmentation (*Zerlegungsgesetz*) and the sharing of income and corporation tax. This is meant to prevent a company with several outlets in different federal states from paying its taxes exclusively in the federal state where its head office is based, while the remaining federal states are not able to take advantage of any tax revenues.

When apportioning the corporation tax, the principle of the business location of the trade tax applies, while the apportioning of the personal income tax between the federal states is based on the principle of the taxpayer's place of residence.

The law of segmentation and the principle of the taxpayer's place of residence has the following impact for the companies and the local tax offices. The companies and firms have to pay the wage tax of their employees to their local tax office. The local tax office has to transfer the wage tax of the employee, if the employee lives in another state. This situation is quite usual in Germany, because a huge number of employees commute from the suburbs to city centre – especially at the city states of Hamburg and Bremen or drive a long distance to their place of work; example, from the eastern state of Thuringia to the western state of Hesse. The following Table 4 shows that this “clearing effect” (To lower the administration costs exist a distribution key for this process in Germany, which is recalculated every three years) has a enormous impact for the city states of Hamburg and Bremen as well as for the state of Hesse in the fiscal year

of 2004.

This principle of apportioning the taxes is also applied when determining the percentage that the federal states receive of the value added tax. Article 107, section 1, clause 4 of Germany's constitution stipulates that at least 75% of the generated VAT to which the federal states are entitled has to be distributed among the federal states according to the number of their inhabitants. The remaining 25% is distributed as an additional percentage to the financially weak states. Particularly because of Germany's reunification and the resulting incorporation of the new federal states into the Federal Republic of Germany, this financial redistribution has gained enormous significance. Figure 4 serves to better illustrate the instrument of VAT redistribution and its effect in the fiscal year 2004 (Each of the 16 Federal States has an abbreviation, which is explained in the appendix).

It is clearly recognisable that already by redistributing the VAT; the new and financially weaker German states have come very close to reaching the average level of financial strength of the federal states.

Under the narrow definition of the fiscal equalisation system among the federal states, there are direct horizontal transfer payments between the federal states. The legal basis of these transfer payments is section 4 of the fiscal equalisation law (*Finanzausgleichsgesetz*).

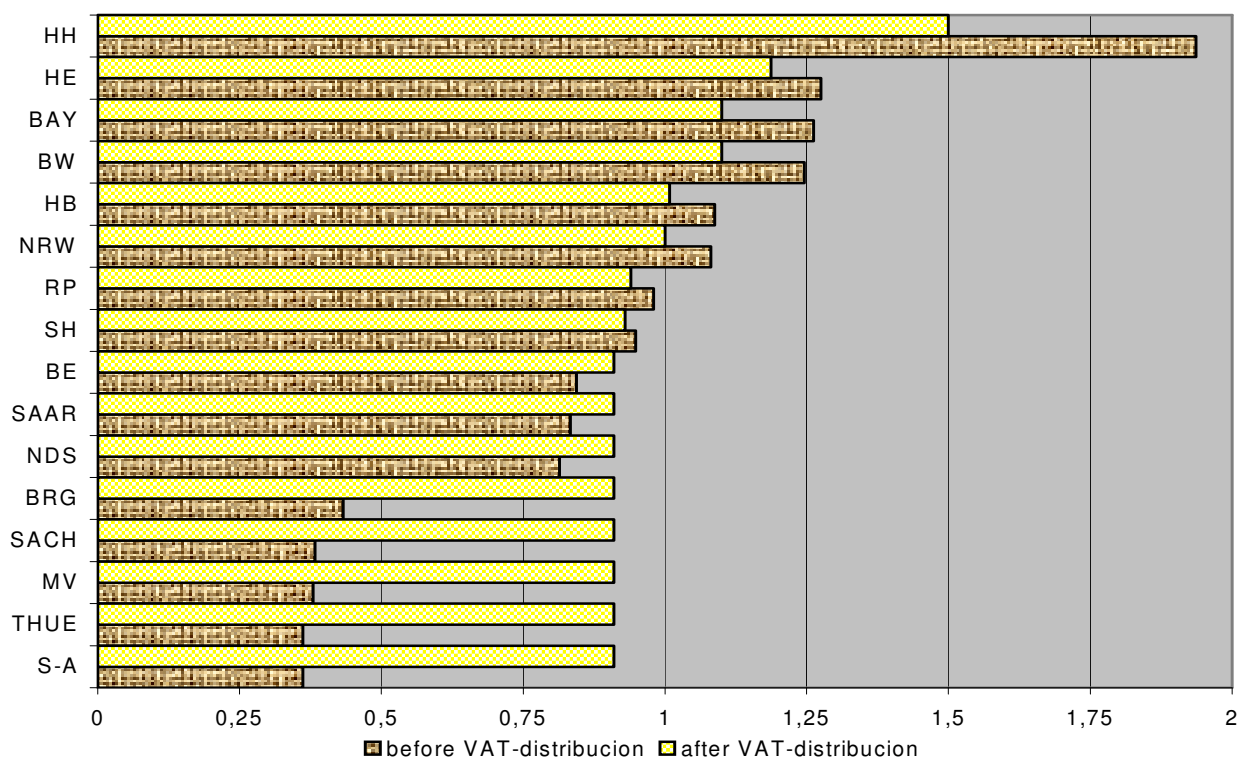
So as to determine the financial strength of every single federal state, one has to calculate the financial strength indicator in the fiscal equalisation system. This figure is composed of a state-specific total sum of state taxes as well as 50% of the municipal taxes. The federal states of Bremen, Hamburg, Lower Saxony and Mecklenburg-West Pomerania are allowed to reduce their financial strength indicator on account of seaport charges, but the coastal state of Schleswig-Holstein is exempted from this regulation. All in all, this reduction due to port charges amounts to a yearly total of around €150 million.

Under the fiscal equalisation system, the financial requirements of each state are determined on the basis of an equalisation indicator. This equalisation indicator is

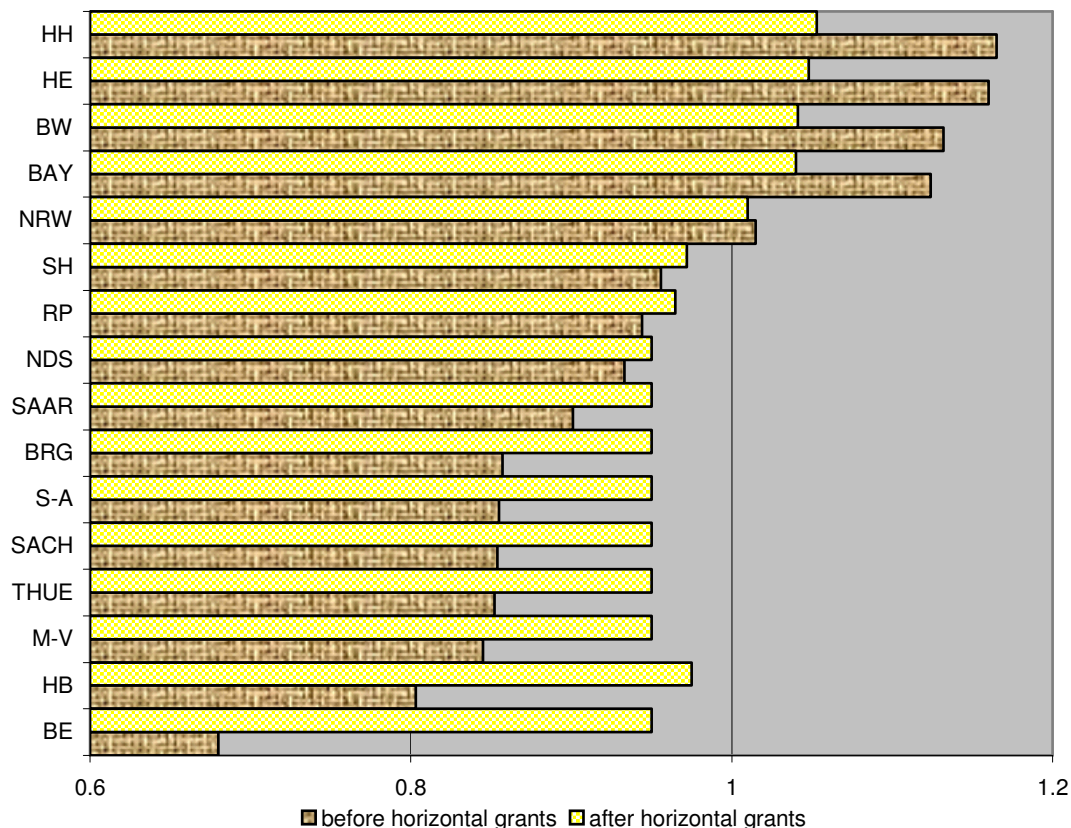
**Table 4.** Effect of place of residence at the wage tax for 16 states at the fiscal year of 2004.

	Population in Mio	Balance at the wage tax due to the law of segmentation	
		Amount in € Mio	Portion of the wage tax
States with a negative balance at the wage tax segmentation	--	--	--
North Rhine-Westphalia	18.069	- 1,987	-6.3 %
Baden-Wuerttemberg	10.706	- 1,230	-5.9 %
Hesse	6.088	- 1,763	-12.12 %
(Hanseatic City) Hamburg	1.736	- 2,310	-37.3 %
(Hanseatic City) Bremen	0.662	- 32	-27.5 %
States with a positive balance at the wage tax segmentation	--	--	--
Bavaria	12.427	59	0.2 %
Lower Saxony	8.001	1,720	14.8 %
Rhineland-Palatinate	4.057	1,376	31.1 %
Schleswig-Holstein	2.825	1,074	36.6 %
Saarland	1.058	35	2.6 %
Berlin	3.386	187	4.2 %
Saxony	4,306	771	34.4 %
Saxony-Anhalt	2,510	601	51.7 %
Thuringia	2,364	557	50.6 %
Brandenburg	2,568	840	62.5%
Mecklenburg-Western Pomerania	1,726	365	59.6%
Total	82,498	7,633	4,6 %

Source: Author.

**Figure 4.** Effect that the redistribution of the remaining percentage of VAT had in 2004.

Source: own calculations.



**Figure 5.** Effect of the horizontal fiscal equalisation as a percent of mean financial strength among Germany's federal states in 2004.  
Source: own calculations.

calculated by multiplying the number of inhabitants of that state by the average nation-wide per-capita figure of the state and municipal tax revenues. While state tax revenues are considered completely, the municipal taxes are only taken into account at 50% of this collection. Moreover the inhabitant numbers of the city-states of Hamburg, Bremen and Berlin have been "readjusted", that is, their inhabitant numbers have been multiplied by the factor 1.35. This "adjusted" is discussed very controversial in Germany (Baretti et al., page 16 - 18 and Hickel, 2001, page 4). Besides, there are additional allowances of 6% when calculating the financial requirements for densely populated regions for the non city-states (Andel, 1998).

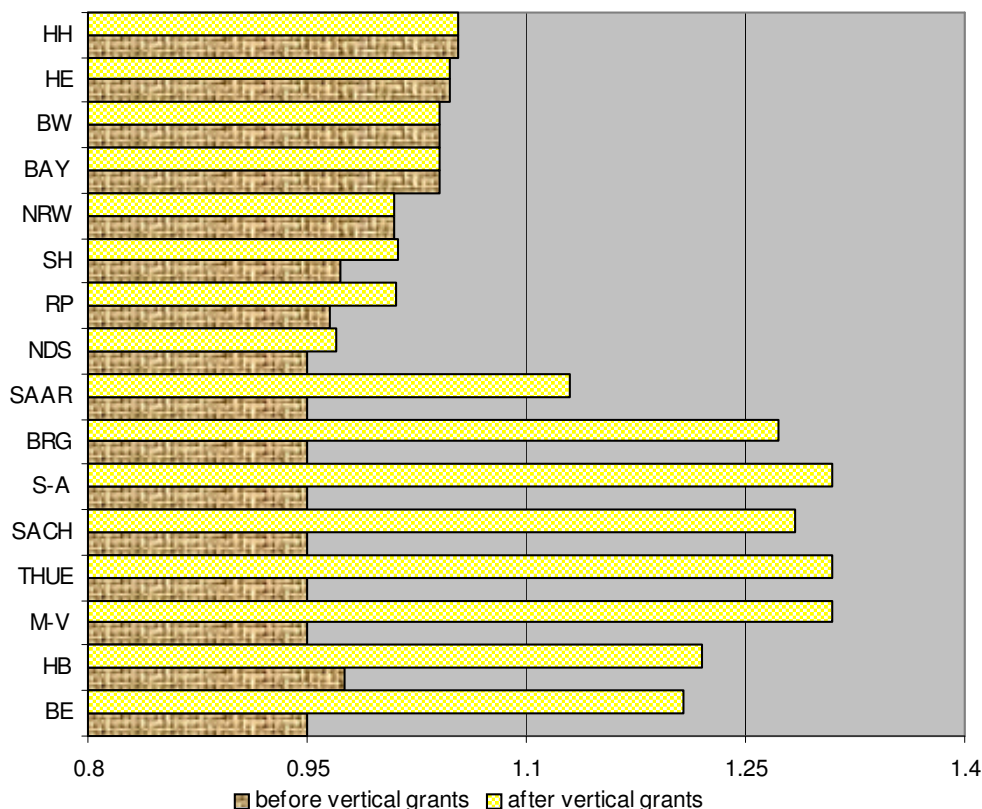
If the financial requirements of a federal state are higher than its financial strength, this state will receive equalisation funds from the financially stronger states, whose financial strength is higher than their requirements. By means of these equalisation funds, the "recipient states" among Germany's federal states are able to increase their financial strength to at least 95% of nation-wide financial strength. At the same time, the financial strength of the "donor states" must not fall below 100% of the average nation-wide financial strength. Figure 5 outlines the effect of the horizontal fiscal equalisation among

Germany's federal states in 2004.

On account of the additional funds allocated by the central government, there are vertical grants from the federal government to the federal states. In 2001, the equalisation volume of the central government's additional funds amounted to about €12.6 billion in total.

Regarding the central government's allocation of additional funds, a distinction can be made between the allocation of deficit-coverage funds and special requirement funds (A detailed description of the vertical funds and their criteria is located in the appendix). The deficit-coverage funds enable the financially weak "recipient states" to reach 99.5% of the average financial strength of the federal states. The allocation of special requirement funds means that for particular reasons, some federal states receive additional funds from the federal budget. Thus, for example around € 0.75 billion a year flows to all those federal states with less than four million inhabitants in order to compensate for the disproportionately high political and administrative costs. The Hanseatic city of Hamburg does not benefit from this regulation. In addition, there are special allocations of funds for budgetary crises (Bremen and Saarland), for the abolition of special charges relating to Germany's division (Berlin and all new federal states) as well as for the integration of the new





**Figure 6.** Effect of the vertical allocation of funds on the federal states in 2004.  
Source: Own calculation.

Federal States into the fiscal equalisation system (Bremen, Saarland, Rhineland-Palatinate, Lower Saxony and Schleswig-Holstein). Figure 6 illustrates the effect of the vertical grants in 2004.

The fiscal equalisation system in its current form is a highly contentious issue. The federal states of Baden-Württemberg, Bavaria and Hesse have filed successful lawsuits at Germany's Constitutional Court in Karlsruhe. For this reason, a reform of the fiscal equalisation system had to take place before the end of 2002, as otherwise the way it is currently practised would have been unconstitutional from 2003 onwards and thus it would have lacked legal legitimacy. On 23<sup>rd</sup> June 2001, the federal states and the central government agreed on a reform of the fiscal equalisation system, which will come into force from 2005 onwards and will last until 2019. The basic points of Germany's "Solidarity Pact II" are outlined in the next section.

### Germany's "Solidarity Pact II" – Regulations governing the fiscal equalisation system until 2019

With Germany's Solidarity Pact II and the corresponding changes to the law, numerous interconnected elements of Germany's fiscal federalism have been reformed. All in

all, the following areas have been affected by the changes to the law:

- I. The allocation of the respective VAT share to the federal states.
- II. Fiscal equalisation among the federal states (narrow definition).
- III. The allocation of additional funds by the central government.
- IV. The "German Unity" fund.

From 2005 onwards, when allocating each federal state a share of the VAT, the current system of a replenishment rate of 100% will be replaced by a relative replenishment system. By changing this rate, a higher VAT volume altogether will be distributed, and more financially weak states will reap the financial benefits of the remaining share of the VAT.

In the horizontal fiscal equalisation among the federal states, some parameters of the assessment basis will be newly defined. As a result, from 2005 onwards the coastal states of Hamburg, Mecklenburg-West Pomerania, Bremen and Lower Saxony will no longer be able to claim port charges as a factor in reducing their tax strength. At the same time, the central government will allocate vertical grants of around €35 million per year in financial compensation to the affected states.

The readjustment of inhabitants in the three city-states of Hamburg, Bremen and Berlin by a factor of 1.35 will persist; however, from 2005 onwards, thinly populated states (The federal state of Mecklenburg-West Pomerania is taken into account with the factor 1.05, the state of Brandenburg is given the factor 1.05 and Saxony-Anhalt is allowed to multiply its municipal tax requirements by 1.02) will also be taken into account when assessing municipal taxes. At the same time, the current municipal assessment of inhabitants, which was graded according to the size of the municipality and the density of its inhabitants, will be scrapped.

When assessing the real tax strength of the municipalities in the individual states, which until 2005 will be determined on the basis of uniform assessment rates regarding the trade tax and the real property tax, these fictitious assessment rates will no longer be applied under Germany's "Solidarity Pact II".

Another aspect to consider in the horizontal equalisation is the increase from 50 - 64% when taking into account the revenues from the municipality tax. This step allows for a stronger consideration of the financial strength of the municipalities and hence takes more into account the fact that in financially strong states, there are usually also financially strong municipalities. From a financial viewpoint, it would be right to take into account 100% of the municipal taxes (see SVR, 2001, page 5). However, a reduction of 36% as an exemption has been stipulated in the law on measures (*Maßstabgesetz*).

The increase from 50 - 64% constitutes the biggest change within the horizontal fiscal equalisation. Yet the preference given to federal states with financially strong municipalities, which was inherent in the previous system, has thus only been reduced, and not completely abolished.

A so-called premium model will be newly introduced from 2005 onwards, which is meant to provide positive incentives both to the donor states and the recipient states under the fiscal equalisation system. By disregarding a flat percentage of 12% of above-average tax receipts and below-average tax shortfalls, the respective federal states are to be rewarded for positive developments regarding their tax revenues.

The rates governing the horizontal equalisation figures among the federal states have also been modified, and from 2005 onwards, there will be a change from the graduated tariff to a steady and linear tariff with considerably lower siphoning-off rates as far as the donor states are concerned. Consequently, the donor states no longer have to expect a siphoning-off rate of up to 80%, but only a rate of 75% at the most. The following Figure 7 deals with the marginal rates of compensation before the framework of Solidarity Pact II (red-continuous line) and from 2005 onwards (black-dashed line).

There are also a number of new regulations concerning the vertical allocation of additional funds from the central government. For example, the vertical allocation of addi-

tional funds from the central government of €770 million in total per year, which go towards the costs of political administration and are paid to the thinly populated states, will be lowered to €520 million annually from 2005 on. Besides, in addition to the nine federal states, which already receive this money, the federal state of Saxony will also receive these vertically allocated funds from 2005 onwards.

The vertical grants for budgetary crises, which the federal states of Bremen and Saarland receive, as well as the central government funds for the integration of the new federal states into the fiscal equalisation system, which the federal states of Bremen, Saarland, Rhineland-Palatinate, Lower Saxony and Schleswig-Holstein receive, will last be granted in 2004 and discontinued in 2005 onwards.

The allocation of central government funds for the burden placed on the states by the division of Germany, which the East German states receive, will be set at €10.5 billion in 2005 and will gradually be reduced over the period of the "Solidarity Pact II" to €2 billion annually in 2019 (A detailed apportionment is located in the appendix).

The tariffs relating to the deficit-coverage funds allocated by the central government have also been reviewed and will provide positive incentives, due to their lower replenishment level combined with an increased number of federal states entitled to receive these funds.

In addition to the above-mentioned new regulations, Germany's central government will also take over all annual debt repayments of the "German Unity" fund, thus relieving the West German states of this burden.

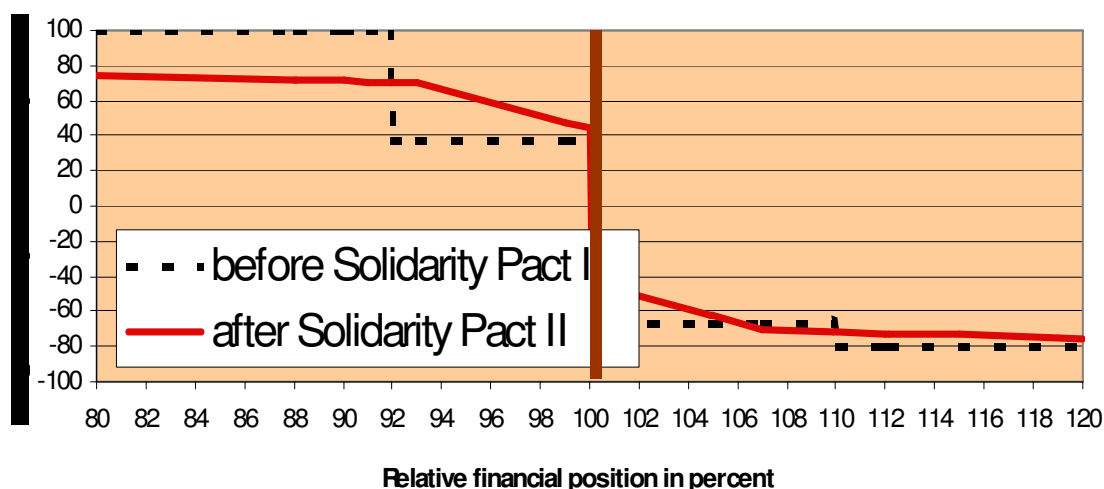
All in all, the new regulations mentioned above constitute an additional financial burden on the central government, and for this reason the central government and the federal states have agreed on a yearly compensation of around €1.32 billion to be paid to the central government from the VAT tax revenues.

The following chart illustrates both the impact of the horizontal as well as the vertical equalisation among the federal states up to 2005 (before the Solidarity Pact II) and from 2005 onwards (after the Solidarity Pact II) and is based on the tax receipts of 2001. It is easy to see that particularly the removal of the vertical allocation of funds for budgetary crises to Bremen and Saarland, and the first-time consideration of Saxony as a recipient of vertical funds towards the costs of its political administration have an enormous effect (Figure 8).

## Conclusion and some policy implications

The German equalisation system gains advantages as well as some negative impacts. On the hand, the equalisation system reduces the economic disparities between the states. Although the two parts of Germany were reunited more than a decade ago, there are still enormous inequalities between the west and East German

## Compensation of marginal tax revenue (compensation rates in percent)



**Figure 7.** Marginal rates of compensation before and after the Solidarity Pact II.  
Source: Spahn / Werner, 2007, page 103.

states in many aspects of every day life. In addition to quite different unemployment rates in West Germany, the unemployment rate was 6.9 % in January 2009, while it was at 13.9 % in East Germany during the same month – there are also enormous differences as far as income and private wealth are concerned. While in 2003, every household in West Germany had average assets of €149,000, East German households had, on average, assets of only €60,000. In terms of income levels, the relation is similar. (Werner, 2006). In 2005, the gross annual income of a salaried West German employee was €25,567 while in the new federal states people only received a comparable gross income of €20,481 annually.

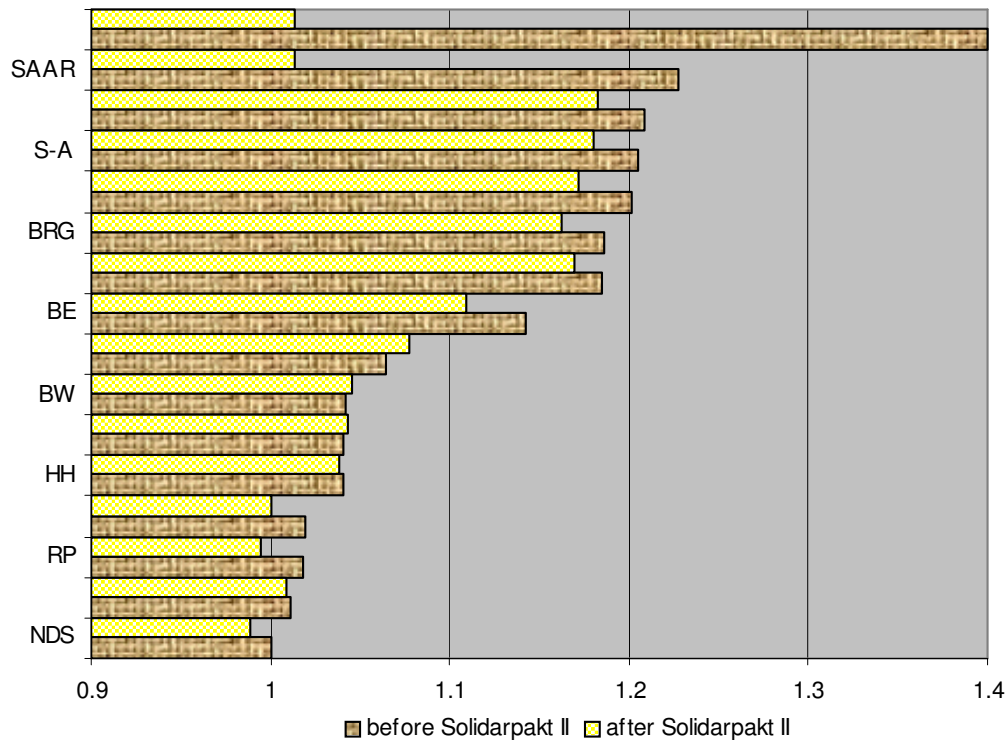
Additionally the equalisation systems can be compared with insurance for the states to lower the risk of “external shocks”. Therefore the German equalisation system fulfils the goal of stability (Spahn, 1998).

Moreover the equalisation system has also originated some “success story”. The former economically weak and agriculturally structured state of Bavaria (Furthermore it have to underline that in Bavaria always the same party – namely the CSU – rules since the end of the World War II) is nowadays one important donor states in systems. But on the other hand, the huge equalisation level produces some negative impacts, because the donor states as well as recipient states have no incentives to attract new tax sources or to siphon off the already available tax resources completely. The equalisation systems punish every extra tax administration effort of the states due to of extreme high siphon off rates. For this reason some of the states have to thin out their tax administration. As matter of course they do not

confirm this behaviour officially and the states Finance Ministers react mostly quite nervous on this “political minefield” (The majority of states are not willing to transfer the tax administration to the central government, because they see the decentralized tax administration as a feature of the German federalism and interpret any delegation to the center as a political loss of power. Moreover, some politicians are even unwilling to see the problems from tax lose or doubt the results of independent research commissions; see Linsen/Fahrenschon, 2008). However, Table 4 points out the different “Audit Probability” in some German states (The three city states of Berlin, Hamburg and Bremen are not mentioned, because as city state their respective “Audit Probability” is as a matter of fact very high) for the years 1997 and 1999, because the “Audit Probability” in this table is measured as the number of tax clerks per 1,000 taxpayers (Tables 5 and 6).

Therefore, the complete delegation of the tax administration from the Spanish central government rather the AEAT towards the Comunidades autónomas should be avoided. For example a Catalan tax administration, which has to collect the value added tax or even the cooperated income tax from Catalan taxpayers and has to transfer this amount to Madrid in a common tax pool and Madrid would distributes this amount between the Comunidades autónomas, has some “political” incentives to collect not the complete taxes (Some empirical evidence for the connection between the tax administration and the political power at the regional level have already been presented; see Esteller-Moré, 2005).

However, what could be could be a positive feature for



**Figure 8.** Effects of the Solidarity Pact II, based on the tax revenues of 2001.  
Source: Werner, 2003, page 92.

**Table 5.** Effect of place of residence at the wage tax for 16 states at the fiscal year of 2004.

	Population in Mio	Balance at the wage tax due to the law of segmentation	
		Amount in € Mio.	Portion of the wage tax
States with a negative balance at the wage tax segmentation	--	--	--
North Rhine-Westphalia	18.069	- 1,987	-6.3 %
Baden-Wuerttemberg	10.706	- 1,230	-5.9 %
Hesse	6.088	- 1,763	-12.12 %
(Hanseatic city) Hamburg	1.736	- 2,310	-37.3 %
(Hanseatic city) Bremen	0.662	- 32	-27.5 %
States with a positive balance at the wage tax segmentation	--	--	--
Bavaria	12.427	59	0.2 %
Lower Saxony	8.001	1,720	14.8 %
Rhineland-Palatinate	4.057	1,376	31.1 %
Schleswig-Holstein	2.825	1,074	36.6 %
Saarland	1.058	35	2.6 %
Berlin	3.386	187	4.2 %
Saxony	4,306	771	34.4 %
Saxony-Anhalt	2,510	601	51.7 %
Thuringia	2,364	557	50.6 %
Brandenburg	2,568	840	62.5%
Mecklenburg-Western Pomerania	1,726	365	59.6%
total	82,498	7,633	4,6 %

Source: Author.

**Table 6.** Audit Probability in German States for the years 1997 and 1999.

	1997	1999
North Rhine-Westphalia	4.71255	4.4731515
Bavaria	3.85792	3.7885001
Baden-Wuerttemberg	4.39388	4.1519066
Lower Saxony	4.37292	4.4472924
Hesse	4.73701	4.6529072
Saxony	4.89705	4.8849013
Rhineland-Palatinate	4.81786	4.7529658
Saxony-Anhalt	5.41163	5.2080417
Schleswig-Holstein	4.27887	4.2064463
Thuringia	5.0373	4.8945202
Brandenburg	5.27095	4.8932231
Mecklenburg-Western Pomerania	5.71429	5.4771242
Saarland	4.8601	4.7840633

Source. Torgler / Werner, 2005, page 87.

the Spanish case is the value added tax distribution in Germany, which is based mainly on per capita. Such an additional tax sharing can be used to abolish the majority of the vertical special grants from Madrid to the regions. This development can increase the transparency of the Spanish fiscal federalism and can also "steal" the politicians in Madrid their instrument to prefer their favourite regions.

Last but not least it is always a political choice how far an interregional solidarity in an equalisation system is developed. Surely the German equalisation system needs more competitive elements and the so-called premium model, which will be newly introduced from 2005 onwards, is a first important step in the right direction. However, in this area, too, Germany's fiscal federalism needs to be further reformed. Particularly, the consideration of the municipal revenues at a level of 64% and the vertical grants for special requirements will need to be re-examined. To strengthen the political accountability of the states in relation to their citizens and voters a solution could be to admit the states a surcharge to the personal income tax like in Switzerland or in the Nordic countries (Werner, 2008).

Moreover, the German local public finance suffers from a tremendous complexity and all things considered (for a survey of the local public finance and the reform proposal of "the three pillar model" Werner 2003, 2006; Guihéry/Werner, 2005) and therefore the German fiscal federalism was, is and will be in an extreme state of flux.

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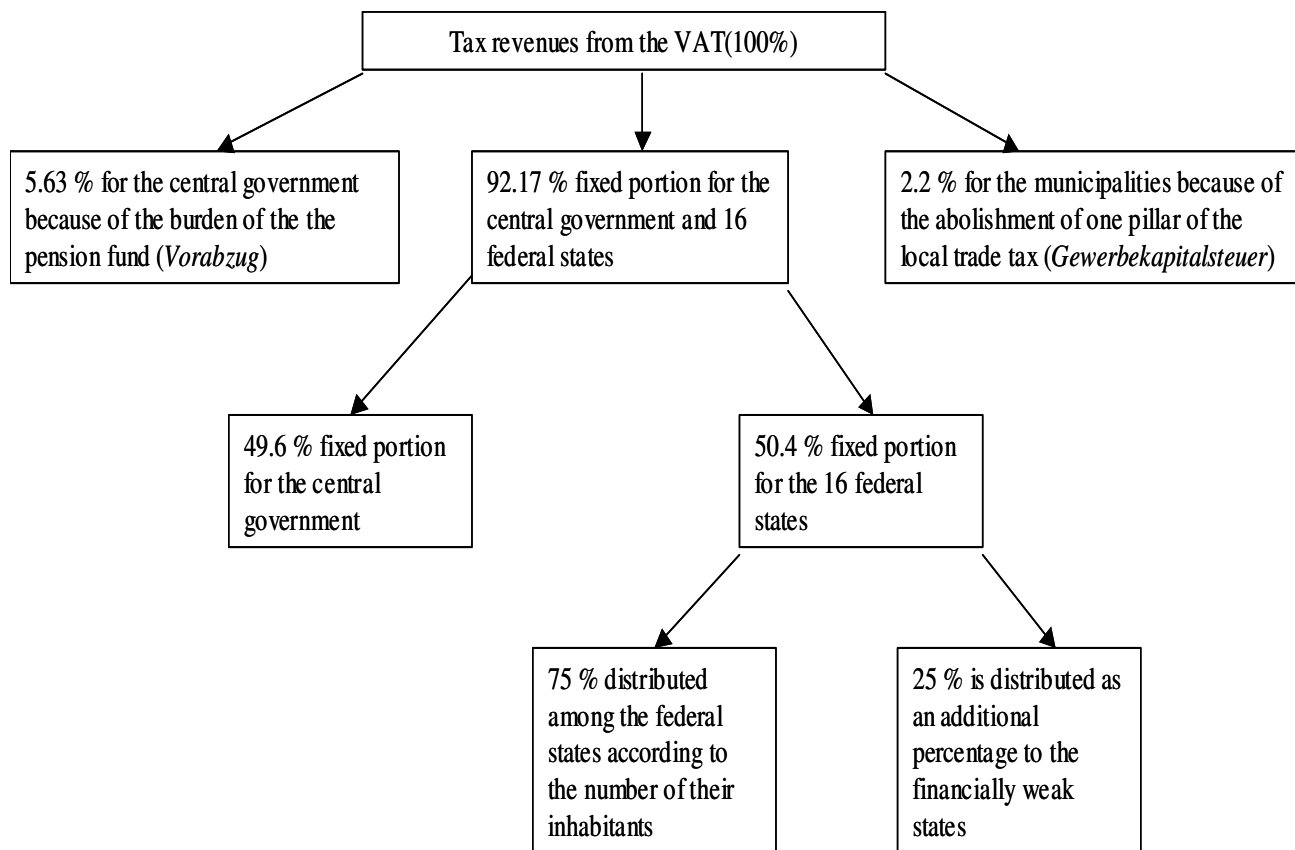
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## Appendix

**Table A1.** Abbreviations of the German federal states.

	German	English
S-A	Sachsen-Anhalt	Saxony-Anhalt
MV	Mecklenburg-Vorpommern	Mecklenburg-Western Pomerania
THUE	Thüringen	Thuringia
SACH	Sachsen	Saxony
BRG	Brandenburg	Brandenburg
SAAR	Saarland	Saarland
NDS	Niedersachsen	Lower Saxony
RP	Rheinland-Pfalz	Rhineland-Palatinate
SH	Schleswig-Holdstein	Schleswig-Holstein
NRW	Nordrhein-Westfalen	North Rhine-Westphalia
BW	Baden-Württemberg	Baden-Wuerttemberg
BAY	Bayern	Bavaria
HE	Hessen	Hesse
BE	Berlin	Berlin
HH	(Hansestadt) Hamburg	(Hanseatic City) Hamburg
HB	(Hansestadt) Bremen	(Hanseatic City) Bremen

Source: Author.

**Figure A1.** The VAT-Distribution between the central government, the 16 states and the municipalities in the fiscal year of 2004.  
Source: Author.

**Table A2.** Types and criterions of the different vertical grants from central government towards the states in the fiscal year of 2004.

Type	Criteria	Volume in € Mio.	recipient states
Deficit-coverage funds ( <i>Fehlbetragsbundesergänzungszuweisung</i> )	Enable the financially weak "recipient states" to reach 99.5% of the average financial strength of the federal states	3.040	Saxony-Anhalt, Thuringia, Saxony, Brandenburg, Mecklenburg-Western Pomerania, Lower Saxony, Saarland, Rhineland-Palatinate, Schleswig-Holstein, Berlin, Bremen
Special requirement funds for political administration costs ( <i>Sonderbedarfszuweisungen für überdurchschnittliche Kosten der politischen Führung</i> )	States with less than 4 million inhabitants	790	Saxony-Anhalt, Thuringia, Brandenburg, Mecklenburg-Western Pomerania, Saarland, Rhineland-Palatinate, Schleswig-Holstein, Berlin, Bremen, <u>but not</u> Hamburg
Special requirement funds for the burden by the division of Germany ( <i>Sonderbedarfsbundesergänzungszuweisungen aufgrund teilungsbedingter Sonderlasten</i> )	All states, which were newly formed by the German reunification	10.530	Saxony-Anhalt, Thuringia, Saxony, Brandenburg, Mecklenburg-Western Pomerania, Berlin
Special requirement funds for the integration of the new federal states into the fiscal equalisation system ( <i>Übergangszuweisungen aufgrund der Integration der neuen Bundesländer in den Länderfinanzausgleich und den daraus resultierenden Belastungen für finanzschwache westdeutsche Flächenbundesländer</i> )	All western states, which received relatively lower transfers from the donor states due to the integration of the eastern states in the fiscal equalisation system	69	Lower Saxony, Saarland, Rhineland-Palatinate, Schleswig-Holstein, Bremen
Special requirement funds for budget crisis	High ratio of the debt revenue ratio	614	Bremen, Saarland
Total	---	15.043	---

Source: Author.

**Table A3.** Development of vertical grants for the states burden by the division of Germany until the fiscal year 2020.

Year	Amount
2005	€10.53 billion
2006	€10.48 billion
2007	€10.38 billion
2008	€10.23 billion
2009	€9.51 billion
2010	€8.74 billion
2011	€8.03 billion

**Table A3.** Contd.

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2012	€7.26 billion
2013	€6.54 billion
2014	€5.78 billion
2015	€5.06 billion
2016	€4.29 billion
2017	€3.58 billion
2018	€2.81 billion
2019	€2.10 billion
2020	€0.00 billion

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**Source:** Author.