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The German Central Health Fund—Recent developments in health care financing in Germany[☆]

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ABSTRACT

In 2009, Germany's Statutory Health Insurance System underwent a major financing reform. A uniform contribution rate set by government was introduced. Sickness funds retain only limited autonomy in charging additional premiums. A dynamic subsidy from general revenue was introduced. The aims of the reform were: (1) intensifying competition, (2) gearing competition towards quality and efficiency, and (3) increasing financial sustainability. This article describes the reform, presents the experiences made, and evaluates whether the policy aims have been met.

Experiences have been mixed: on the one hand, the new arrangement showed a high level of flexibility in dealing with the severe recession in 2009. On the other hand, the new system of price differentiation has proven to be dysfunctional. Payments to sickness funds are based on predictions. But predictions have been of limited accuracy, and this has led to an accumulation of liquidity in the system.

Price competition has been effectively eliminated. The intended surge in quality and product competition failed to appear, as sickness funds remain concerned mainly with their short term financial outlook. SHI finance has become more linked to the federal budget, leading to a higher level of political interventions. These arrangements will need a new reform – probably after the next general election in autumn 2013.

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1. Introduction

The German mode of financing health care is still considered the classic case of social insurance. Government-mandated health insurance with compulsory funding by

employers and employees, as designed by Bismarck's Social Health Insurance Act of 1883, has become known as the “Bismarck model”, and is often contrasted to the “Beveridge model” of a National Health Service. In the Bismarck model, the funding base is wages and salaries; the contributions drawn from these are the basis of entitlement. Until recently in Germany, each sickness fund set its own contribution rate. The role of government in this self-governmental model is ideally at arm's length, reduced to setting the regulatory framework [1,2].

Today, the Bismarck model is facing many challenges. Originally constructed as an entitlement associated with labour status, it did not achieve universal coverage. Germany gradually expanded coverage, but still left out a very small part of the population. The real challenge, however, is financial. Funding based on wages up to a

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dynamic income threshold is too small a base to finance the expanded coverage with all the services and benefits. Concerns about competitiveness in the global economy and high rates of unemployment put a downward pressure on payroll taxes.

After long and controversial discussions, Germany settled for a major reform of health care finance in 2009.¹ Finally, the last remaining loopholes in statutory and private coverage were closed. The revenue base was widened through subsidies from general revenue. A Central Health Fund (CHF) was introduced. The government now sets a uniform contribution rate for all funds, whereas funds retain only a limited possibility to levy additional premiums.

These changes are probably the most fundamental alterations in the financial arrangements of Germany's statutory health insurance (SHI) system since the establishment of free choice of sickness fund in 1996 [5]. Since then, the SHI system has been evolving towards a managed competition framework [6]. This is a framework in which competition is a means of achieving health policy goals of access, quality and affordability. Cost-sensitive consumers have a free choice of insurer, which offer a standardised package and act as prudent purchasers of care on behalf of the consumers. Competition is regulated in order to account for market failure and achieve the health policy goals.

This paper gives an overview over key elements of the reform in Section 2. Section 3 presents the experience made with the reform based on current data – in particular data from the expert panel (*Schätzerkreis*) – available from the Federal Insurance Office, the institution responsible for administering the CHF. Section 4 evaluates the reform by examining how far the policy aims have been met. Section 5 concludes.

2. The reform of 2009: introduction of the Central Health Fund (CHF)

2.1. Elements of the reform

2.1.1. Uniform contribution rate

A uniform contribution rate for all sickness funds was set by government ordinance on 1 January 2009. Initially, the rate had to be set at a level that guaranteed to cover all SHI expenditure. However, future increases in expenditure should not lead to increases in the contribution rate. Instead, new additional premiums are to be levied. To reinforce this commitment, the contribution rate was fixed by law in 2011. The contribution rate of 15.5% is split between employers and employees. Employees currently pay 8.2% and employers 7.3%, a deviation from traditional parity introduced in 2005 [5].

¹ *GKV-Wettbewerbsstärkungsgesetz* (see [3]). This reform was modified by the *GKV-Organisationsstrukturen-Weiterentwicklungsgesetz* and the *GKV-Finanzierungsgesetz* of 2011 (see [4]). This paper presents the current status of reform (2012) and refers to prior stages only if necessary.

2.1.2. Federal subsidy from general revenue

Traditionally, SHI received no support from general revenue. In 2009, a federal subsidy of €4bn was introduced.² This subsidy was to rise annually by €1.5bn until reaching €14bn in 2016. The subsidy was justified as compensation for the service to society brought by providing free insurance to family dependants. The volume of €14bn corresponds roughly to the cost incurred by children and youths up to age 18. The annual rise of €1.5bn corresponds to the usual gap between the rise in expenditure and revenue. So, basically, this construction was expected to put the SHI on a sustainable financial path until 2016. In reality, the dynamics of the federal subsidy turned out to be completely different (see Section 3.1).

2.1.3. Introduction of the CHF

Sickness funds remain responsible for collecting contributions, but have to transfer the revenue directly to the CHF. The CHF pools this revenue with the federal subsidy. The CHF then makes payments to the sickness funds. For this purpose, the CHF must (a) set the overall level of payments to all funds and (b) calculate the individual sickness funds' share.

a. Setting the overall payment level

Every year, by November 1, the Federal Ministries of Health and Finance – advised by a panel of experts (*Schätzerkreis*) [7] – have to predict unanimously the average additional premium for the coming year. This is defined as the excess of predicted SHI expenditure over CHF payments divided by the predicted number of SHI members. CHF payments are defined as predicted CHF revenue (but limited to the level of expected SHI expenditure). This official prediction becomes binding for the CHF, i.e. payments to sickness funds are guaranteed at this level irrespective of actual revenue.

b. Calculating the individual sickness funds' share

Sickness funds receive four different payments from the CHF.

- i. Payments to cover the standard benefit package (92% of all payments). These payments are risk adjusted with an improved formula (see Section 3.2).
- ii. Payments to cover administration costs (5.2% of all payments). Half of this payment is made per capita; the other half is proportional to the risk adjusted payment.
- iii. A flat payment per capita to cover the voluntary benefit package.
- iv. And finally, an incentive payment of currently €152 for each participant in a disease management programme.

All payments are standardised, i.e. based on averages per capita or risk class. None of the payments involve reimbursing actual costs.

² A first tax subsidy was introduced in 2004, which reached €4.2bn in 2006. As part of federal budget consolidation, the subsidy was reduced to €2.5bn in 2007 and 2008 was set to terminate in 2009.

2.1.4. Additional premiums and refunds

If CHF payments are not sufficient to cover expenses, a fund is obliged to collect an additional flat-rate premium.³ If payments, however, exceed expenditure, the sickness fund can – but is not obliged to – make a refund to its members. While the employer deduces wage-related contributions, sickness funds have to collect additional premiums separately. This means that their imposition is at least at the beginning associated with considerable administrative effort.

Additional premiums have two objectives: firstly, with full coverage of expenditure by CHF in aggregate, the average premium rate would be zero, but sickness funds would levy premiums or make refunds to reflect their individual financial position. But, secondly, when CHF payments fall short of expenditure in aggregate, sickness funds will have to close the gap, leading to a positive average premium.

2.1.5. Means-tested premium subsidies

With flat-rate premiums, affordability for low income households becomes a problem. Therefore, SHI members are eligible for means-tested premium subsidies that restrict the burden of the average premium to 2% of wages. The means test is performed automatically by the employer or social insurance agency by reducing the deduction for SHI contributions.⁴

By reducing SHI contributions, premium subsidies lead to a loss of revenue for the CHF. Payments to the sickness funds remain unaffected. The idea is to compensate the shortfall from the federal budget as of 2015. Until then, any possible loss has to be borne from CHF reserves.

Premium subsidies are based on average – not actual – premium rates. If the actual rate is above average, the individual burden may exceed 2%. But it is argued that everybody will have the possibility to switch to a fund with an average or below-average premium. This construction keeps members fully sensitive to the premium differences between sickness funds.

2.1.6. Insolvency rules

The reform also made sickness funds subject to insolvency rules. Technically, these already applied to most sickness funds, but now they apply universally and more strictly. Nevertheless, it is still almost impossible to found a new sickness fund.

³ Originally, sickness funds could choose between a flat-rate and a wage-related premium. But flat-rate premiums are more advantageous for high-waged members. Since these usually are better risks, all sickness funds but one that introduced additional premiums decided for the flat-rate version. The option for a proportional rate was abolished in 2011.

⁴ For example, if a person's monthly income were €500, the burden of premium may not exceed €10 per month (€500 × 2%). Now, if the predicted average monthly premium rate were €12, the employer would reduce that person's SHI contributions by €2 (€12 – €500 × 2%), thereby raising her net wage by €2. The person remains liable to pay the full statutory additional premium to the sickness fund, the actual height of which may be higher or lower than €12. The premium subsidy is only paid out if the sickness fund actually levies an additional premium.

2.1.7. Individual mandate

As of January 1, 2009, all residents in Germany are required to obtain health insurance coverage either in the statutory or private system. Until then about 200,000 residents went without coverage. Both private insurance companies and sickness funds are required to make this coverage obtainable [8].

2.2. Illustration: financial flows in 2011

Fig. 1 shows the financial flows for the year 2011.⁵ Total CHF revenue was €184.2bn. Of this, €169bn was drawn from contributions. Payments to sickness funds were set at the level of the originally predicted CHF revenue, €178.9bn. So, mainly due to an unexpectedly good performance of the German job market, the CHF had a positive financial result of €5.2bn. This added to the CHF's reserve, which now amounts to €9.5bn.

Sickness funds receive their revenue mainly from the CHF (€178.9bn). Receipts from additional premiums were €0.7bn. Sickness funds had total expenditure of €175.2bn (of which €164.9bn for benefits as shown in the figure). Hence, sickness funds received CHF payments which were €3.8bn higher than actual expenditure.⁶ The predicted average additional premium was set at zero, so that no means-tested premium subsidies were available.

2.3. Political aims of the reform

The main political aims of the reform were [9–13]:

- Intensifying competition by moving from price differences based on contribution rates to differences based on more noticeable flat-rate premiums.
- Gearing competition towards quality and efficiency: by reducing their options on the revenue side, sickness funds should be induced to concentrate on controlling expenditure and improving services. An improved risk adjustment scheme should reduce disincentives to engage in the care of chronically ill. A detailed account of the possibilities of sickness funds to differentiate on products and services and influence expenditure is beyond the scope of this paper.
- Increasing financial sustainability by widening the revenue base: sickness funds are increasingly financed from general revenue instead of payroll. Employers are to be relieved from the risk of future health expenditure rises, since these will lead to higher additional premiums instead of increasing the contribution rate.
- A further stated aim was to increase the transparency of financial flows.

⁵ The data is taken from the *Schätzerkreis*, prediction of October 10, 2012, available at <http://www.bva.de> and the financial statements of the sickness funds ("KJ1") for 2011, available at <http://www.bmg.bund.de>. Please note that for farmers' funds different financial arrangements apply which were not changed in the 2009 reform. The figures presented therefore do not include data on farmers' funds.

⁶ This is not equivalent to the sickness funds' financial results. These reported a surplus of €4.2bn. Sickness funds receive further revenue – including €0.7bn from additional premiums – and incur further expenses.

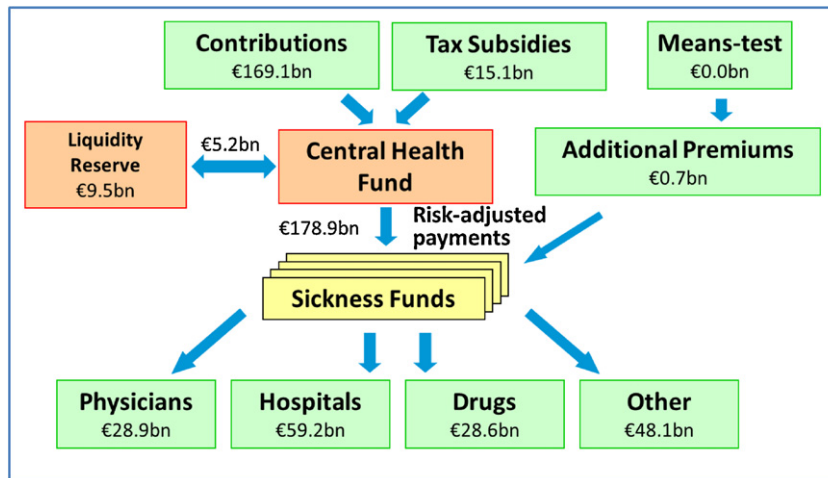


Fig. 1. The Central Health Fund: new financial arrangements, 2011.

3. First experiences with the CHF

3.1. Coping with recession (2009)

In the year of CHF introduction Germany experienced a severe recession. GDP fell by 5.1%. But employment, and therefore wages as the revenue base of SHI, was much less affected. Still, actual revenue of the CHF fell short of predicted revenue by €2.5bn. Since payments to sickness funds were guaranteed, the CHF had to shoulder a financial loss in its first year. At the same time this showed the ability of the CHF to shield sickness funds from risks on the revenue side.

In 2009, as part of a stimulus package, the federal government decided to reduce the uniform contribution rate to 14.9%. This was seen as more effective in stabilising consumption than a tax reduction, since the contribution rate applies to the first Euro of income. The federal subsidy was raised to €7.2bn in order to offset the lost revenue from the reduced contribution rate. In 2010, a second stimulus package contained a one-off increase in the subsidy, as did the Health Insurance Finance Reform Act of 2011. As a result, the federal subsidy in 2010 amounted to €15.7bn, more than originally envisioned for 2016. The uniform contribution rate was raised back to 15.5% in 2011. This economic stimulus through a reduced contribution rate would hardly have been possible in the former framework of decentralised rate setting.

3.2. Accuracy of payments to sickness funds

The prior risk adjustment scheme adjusted for differences based on age, sex, invalidity pension status and enrolment in a disease-management-programme [14–16]. In the new scheme, enrolment has been replaced by a broad morbidity adjustor, based on recorded diagnoses and prescriptions for 80 severe or costly chronic diseases [17,18]. The government called for an evaluation by the Scientific Advisory Board on Risk Adjustment [19]. The report showed a marked improvement on the prior scheme, but

also pointed out that underpayments for high age, diseases with high mortality, multi-morbidity, and urban regions remain. The evaluation also revealed formidable differences in the financial position of sickness funds.

3.3. Introducing additional premiums

All funds started the year 2009 without charging an additional premium. In July 2009, the first fund ran out of reserves, making the introduction of an additional premium necessary. By 2010, 15 other funds followed. The experience of these funds with the new financing mechanism was devastating. All sickness funds with additional premiums suffered severe attrition in membership. One sickness fund lost 40% of members. Other sickness funds had a higher membership loyalty, but still lost 5–10% [20]. The switchers were the remaining young and healthy. Since the risk adjustment scheme still overpays for these groups and underpays for the rest [18], this added to the deteriorating financial position of these funds. The sickness funds concerned had hardly any other chance than to find a more solvent fund to merge with. The number of sickness funds fell from 206 funds at the end of 2008 to 136 funds in 2012.⁷ Two sickness funds were in such dire straits that they could not find any other fund willing to merge with them. These funds went insolvent and had to be closed. By October 2012 all sickness funds but one have either merged, been closed, or otherwise abolished their additional premium.

3.4. Experiences with insolvency

Two funds were closed for insolvency. Normally, closure should not be a problem. Guaranteed issue and open enrolment apply, so members can switch to any other sickness fund, which is obliged to take them. There are provisions for

⁷ The number of sickness funds has been declining continuously for many years from more than 1200 funds in 1992 (without farmers' funds). But the motive of merger has changed: Most mergers are now motivated by the avoidance of additional premiums.

a seamless transition of claims and payments. But the first insolvency turned out to be everything other than seamless. Members of this fund had problems finding a new one. One fund claimed that switching was only possible if the applicant appeared in person at a remote branch office with reduced opening hours; another large fund apparently closed all branch offices in the relevant area for “renovation”; calls went unanswered, etc. These activities were clearly illegal, and the supervisory authorities stepped in. But the damage was made, and parliament reacted by making the CEO of a sickness fund personally liable for any such activity in the future.

3.5. Accuracy of predictions

As the overall level of CHF payments is based on predictions, the quality of these becomes vital. Table 1 gives an overview over the accuracy of predictions since instalment of the CHF. In 2009, the year of a severe economic crisis, actual revenue fell short of predicted revenue by €2.4bn. In 2010, the intensity of the recovery was underestimated.⁸ Actual revenue was €4.2bn higher than expected. By statute, extra revenue is not distributed to sickness funds, but contributes to CHF reserves. In 2011, again, the actual revenue exceeded predicted revenue. Since in that year the predicted revenue exceeded predicted expenditure, payments to sickness funds were capped at €178.9bn. Therefore, €5.2bn were forwarded to CHF reserves, elevating the total stock to €9.5bn.⁹ Current predictions point to a similar situation in 2012, with further €3.2bn added to CHF reserves. Under current regulations, this stock can only be reduced if actual revenue falls short of predicted revenue.

The overall financial position of sickness funds depends on the level of CHF payments in relation to their expenditure. In 2009, payments were fixed at expected revenue, i.e. €166.8bn. This was expected to exactly cover expenditure. In fact, actual expenditure fell short of prediction, leading to a sickness fund surplus of €0.7bn. In 2010, the CHF payments were fixed at €170.3bn. Expenditure was predicted to be €174.2bn. This left an expected gap of €3.9bn, to be covered by sickness funds running down existing reserves or charging additional premiums. But expenditure actually totalled only €171.3bn, still leaving a gap of approx. €1.0bn. Revenue from additional premiums was about €0.7bn, so €0.3bn was drawn from existing reserves. 2010 turned out to be the toughest year for sickness funds yet. It was the year when many sickness funds started collecting additional premiums. 2011 was financially less challenging for sickness funds with a surplus of €3.8bn (see Section 2.2) – as will be 2012 with an expected surplus of €3.9bn. All in all, there has been an unprecedented accumulation of reserves.

⁸ The *Schätzerkreis* does not make own estimates on the general economic situation. It takes the official government estimates as basis and assesses the effect on the SHI revenue base [6].

⁹ Due to arcane accounting rules, the deficit of 2009 is not seen as part of the liquidity reserve, but carried forward from year to year in the CHF's balance sheet.

4. Has the reform met its goals?

4.1. Intensifying competition

One aim of the reform was to intensify price competition by the higher visibility of flat-rate additional premiums. Almost four years after introduction, additional premiums still have not been established. Two factors have proved to be serious impediments to the introduction of premiums¹⁰:

- The transition was based on an average additional premium of zero. But the intensity with which an additional premium of, say, €8 is perceived is higher when comparing to a reference level of zero, than of an additional premium of, say, €38 compared to a reference level of €30 (Weber–Fechner law [21]). It has been estimated that price elasticity trebled [20], which some welcome as intensified competition [22]. But this only holds for the few sickness funds that charge additional premiums. This competitive pressure is so high that it effectively thwarted price competition between sickness funds. The lesson is hence: for additional premiums to work, they have to be universal (i.e. levied by all funds).
- Since additional premiums turned out to be very unpopular, politicians – even those responsible for introducing them – called sickness funds with additional premiums inefficient and advised their members to switch. After the experiences with additional premiums in 2010, the level of CHF payments has been set so high – in 2011 and 2012 CHF payments will cover 102.1% of SHI expenditure – that additional premiums were in effect obliterated. The German Council of Economic Experts [23] predicts that sickness funds will be able to avoid additional premiums well into 2013, the year of the next federal election.

Both elements are important: high price sensitivity has made additional premiums de facto unenforceable. But this avoidance has not been achieved by increased efficiency, but by raising the overall level of liquidity in the system so that all boats are lifted – only that some just manage to keep afloat, whereas others accumulate reserves. A system where sickness funds are entities at financial risk necessitates a system of price differentiation.

4.2. Gearing competition towards quality and efficiency

The effect of the new arrangements on sickness fund activity regarding quality and efficiency of care has not been studied systematically. However, providers increasingly complain about the ‘stinginess’ of funds [24], expenditure on primary prevention has fallen [19: Ch. 10], and there is an on-going discussion on how to finance innovations [25].

The autonomy of sickness funds in generating revenue has been severely reduced. The avoidance of additional premiums has quite literally become a matter of ‘life and

¹⁰ A third factor was the fact that the lost revenue from means-tested premium subsidies originally had to be borne by the sickness fund. This was changed in 2011.

Table 1

Accuracy of prediction for revenue and expenditure, in 2009–2011.

Year	Revenue of Central Health Fund			CHF payments	Expenditure of sickness funds		
	Predicted	Actual	Error		Predicted	Actual	Error
2009	€166.8bn	€164.4bn	–€2.4bn	€166.8bn	€166.8bn	€166.2bn	–€0.7bn
2010	€170.3bn	€174.5bn	€4.2bn	€170.3bn	€174.2bn	€171.3bn	–€2.9bn
2011	€181.1bn	€184.2bn	€2.9bn	€178.9bn	€178.9bn	€175.2bn	–€3.8bn
2012 ^a	€185.7bn	€188.7bn	€3.0bn	€185.4bn	€185.4bn	€181.6bn	–€3.9bn

^a Prediction of 10.11.2012.

death' for sickness funds. Under the uniform contribution rate, some funds are over-financed and others are under-financed. But sickness funds in good financial conditions also centre their strategies on the avoidance of additional premiums. Rather than investing their funds in better provision or returning them as refunds to members, they build up reserves in order to be able to avoid the imposition of additional premiums for as long as possible in the future. Sickness fund reserves exceed €10bn at the end of 2011 – well above the statutory minimum of €4bn. Only five small funds currently offer refunds in 2012 [26].¹¹

The strategies of sickness funds are therefore centred on avoiding additional premiums. Their outlook is fixed on the short term, which means avoiding all projects with upfront investment, e.g. for primary prevention, even if they are profitable in the medium term. This is not a good environment for investments in improving care or value-based purchasing [27], since funds as purchasers need a stable, predictable flow of funds to have a basis for contracting with providers.

4.3. Increasing financial sustainability

Two elements of the reform were intended to increase financial sustainability [28]: an annually increasing federal subsidy and replacing payroll with additional premiums for an increasing share of expenditure.

The federal subsidy was originally devised as formula-based stabilisation of SHI finances. But discretionary changes have become common and altered its character. The idea of a stepwise increase to close the gap between expenditure and revenue has been completely lost. The subsidy is in danger of becoming a stop-gap, the sum constantly renegotiated according to the situation of the federal budget and the SHI budget, respectively. Therefore it seems only consequent that the government has reduced the federal subsidy to €11.5bn in 2013 as reaction to the high level of reserves.

So far, additional premiums have not been established. Anyway, their sustainability is much diminished through the means-tested premium subsidies which bring back income-related financing with all its problems through the back door [29]. When expenditure rises, these subsidies rise as well, with adverse consequences for public finances.¹² The impact of this can be best illustrated with

an example: in the summer of 2011, the Federal Ministry of Health proposed financial incentives for physicians to set up practice in rural areas (*Versorgungsstrukturgesetz*). The Federal Minister of Finance intervened, since he saw future risks for the federal budget. The compromise found is that the expenditure incurred under this law is to be disregarded when calculating the premium subsidies. This gives a preview of debates to come.

5. Conclusion

The new health care financing system in Germany has not found its steady state. It has led to an unprecedented accumulation of reserves. With the fixed contribution rate, a “safety valve” to reduce reserves is missing. These reserves have already attracted the attention of providers and politicians. Price competition has been de facto abolished. The intended surge in quality and product competition failed to appear, as sickness funds remain concerned mainly with their short term financial outlook. Corrective action will become necessary after the next general elections in autumn 2013.

These experiences also hold some implications for reform at the international level. For example, in the Netherlands (additional) premiums have become established at a much higher level. This has led to problems with the means-tested premium subsidies. A reduction in the premium level is therefore discussed [22]. But a reduction that would abolish their universal implementation could lead to the same defects as observed in Germany.

Almost unnoticed, the original Bismarck system is changing its character. It has broadened its coverage from an employment-base to the whole population. And it has widened its financing base from payroll through a substantial contribution from general revenue. This has mitigated the problems of coverage and finance, but has led to new challenges. Most of all, the decision on the macro budget for health care has become centralised and increasingly interconnected with the federal budget. Thus Germany will see much more political debate on the global health care budget – as in Beveridge systems. Together with an extension of choice in Beveridge systems this amounts to a gradual convergence of systems [1,30].

¹¹ After completion of the manuscript some funds – including a large fund – announced refunds for 2013.

¹² The government claims that the reforms of 2011 made unlimited additional premiums possible. But, technically, this is not true. Since the

means test is set at 2% of wages, and wages for this purpose are truncated at €3.825 per month, the additional premiums cannot exceed €76.50 (2% of €3.825). At that point, every member of a sickness fund would become eligible for premium subsidies and all further increases in health care expenditure would be covered Euro for Euro through an increase of premium subsidies from the federal budget.

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