

**From the Academic Republic to the Managerial University**  
**– The Implementation of New Governance Structures**  
**in German Higher Education –<sup>2</sup>**

**1 Introduction: The international context**

According to a recent OECD-study, in nearly all OECD-countries, especially those where the state plays a predominant role in higher education, fundamental reforms have been undertaken during the last years, particularly in the external or internal steering of higher education institutions (OECD, 2003). Usually, these changes have been discussed in terms of governance. Governance has become a prominent international issue in higher education despite the fact that the content and range of this term is often a little bit hazy – due to several reasons, e.g. the different theoretical traditions and understandings of this term (Reed et al., 2002; Amaral et al., 2002; Braun & Merrien, 1999; Kehm & Lanzendorf, 2005, 2007; Schimank, 2002).

However, a common understanding of governance in higher education research includes at least five instances of coordination and, in particular, the relationships between them (Braun & Merrien, 1999):

- the state regulation of higher education,
- the influence of external stakeholders such as agencies,
- the academic staff and self-organization of universities,
- the university management and administration,
- the role of competition and market mechanisms.

The governance perspective tries to combine the external (e.g. the relationships between state and university), the institutional (focusing on a particular institution) and the internal dimension (inside the institution). It analyses the importance and influence of these instances as a field of forces or a network of actors with different power positions and opportunities for par-

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ticipation and intervention. The analytical view of the governance concept does not focus only on a particular instance but also the interconnection between these different players and the procedures of balancing out their influence. The centre of the governance perspective is neither 'the state' nor 'the market' or the 'academic community' exclusively, but their interrelations and, of course, the shifts in this field of forces.

In most OECD-countries, these new approaches of governance have linked state, institutional and market or competition mechanisms in new ways and forms. And they have led to considerable shifts in the co-ordination and authority structure of higher education. Consequences of these reforms can be far-reaching, since they can change the complete shape and operation of higher education institutions, covering not only the authority structure of the university but also the academic domain with many effects for the academic work and its outcomes. One of the most important impacts of these reforms is the gradual abolition of the traditional division of work between the university management and the more or less independent academic area in favour of a massively extended steering influence of the new class of executives.

The OECD-study<sup>3</sup> distinguishes between five elements of governance in higher education:

- (1) *Institutional autonomy*: Apart from private universities, the degree of autonomy with respect to the state varies a lot between the individual countries, in particular between state universities in the Anglo-American countries with a higher degree of independence and those in continental and northern Europe, Turkey or Japan with a lower (sometimes only a very small) degree of autonomy. However, in all countries included an obvious trend of reduction in the direct state influence and control has manifested itself, in some countries even to a considerable extent (e.g. Austria or Japan).

The areas of more or less autonomous decision making also vary a lot. Such areas as tuition fees, access/admission and property management often remain state affairs, whereas programme or syllabus issues, budget allocation or personnel affairs have often become an institutional responsibility. In some countries, the new institutional governance regime includes such tasks as fees, admission or property administration as well. However, it would be oversimplified to assert that there is always a clear or pure trend to more institutional autonomy. In some countries rather, a certain kind of

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<sup>3</sup> Countries included: Mexico, Netherlands, Poland, Australia, Ireland, United Kingdom, Denmark, Sweden, Norway, Finland, Austria, Korea, Turkey, Japan; not included among others: USA, Canada, Germany, France.

state control has been replaced by (or shifted into) another form of external control, accountability or performance assessment, e.g. by boards, funding agencies or agencies for quality assurance. The result, hence, is a new mixture and balance of state and institutional influences.

- (2) *Funding/financing*: In many OECD-countries not only the volume and the composition of funding higher education have changed but also the methods of allocation between and within institutions. The main trends noticeable are
- an increasing proportion of private funding, partly because of a growing number of private institutions, partly because of the introduction or the rise in tuition fees or a larger proportion of third-party funding,
  - the shift from line-item budgets – in continental Europe in the tradition of cameralistic forms of budgeting – to one-line or lump sum budgets,
  - the growing use of formula- or indicator-based procedures of allocation including performance/output or capacity-oriented models and
  - the increased use of contracts and target agreements as instruments of budgeting fixing the results of prior negotiations between state and institutions.
- (3) *Quality assurance*: In most countries involved in the OECD-study, extended autonomy of universities has been linked with the introduction of quality assurance and evaluation agencies often at national, sometimes decentral level. Many of them were founded (and are funded) by the government, but most of them act relatively independently from the state and operate primarily through peer reviews. In some countries there is only one, sometimes there are several such agencies. The decisive idea behind these mechanisms of quality assessment and assurance is that of accountability: more institutional autonomy and public funding require more transparency and justification with respect to the state, the public and the society. But only in a very few countries are funding decisions linked directly to the results of such quality assessments.
- (4) *Institutional steering and management*: The traditional model of institutional steering and management is directed towards consensus-oriented decisions negotiated in the representative committees of the university. The changes caused by the new governance procedures result mainly in two fundamental shifts in the authority structure of

the university: a considerable strengthening and professionalization of the central management and the increasing involvement of external persons (e.g. representatives from industry, the region or the state) or committees in the institutional processes of decision-making. Basically, this can be observed in many countries, but with a lot of national distinctions as can be seen e.g. in

- the responsibilities and the organization of the university management,
- the relationships between the university and intermediate institutions,
- further on in the influence of the academic committees and the division of power between the academic and administrative component of the management.

(5) *Leadership within institutions*: As a part of this reorganization of the university the selection procedures and the qualification requirements of the top management have been changed in many countries. Obviously, there is a trend towards more frequent external recruitment and appointment through external boards instead of election through the academic self-administration and a trend to prefer management and networking qualifications and experience over academic competencies. Nevertheless, in most countries the majority of the top managers continue to have an academic background.

To sum up so far, it can be stated that new concepts of governance in higher education have led to structural and organizational reforms in higher education in nearly all OECD-countries. State and institutional co-ordination have been combined with market and competition mechanisms in new patterns of steering. But the specific mixture of these players often varies among the different countries. Usually, reforms embrace the tentative or gradual implementation of these concepts within specific national idiosyncrasies and with more or less large discrepancies between the idea and reality. In principle, this is also true for Germany: the implementation of new governance procedures and mechanisms represents one of the most important projects in the course of the current fundamental reform, may be transformation (Kogan et al., 2006) of German higher education (Wolter, 2004).

## **2 The national German context: The traditional model of the academic republic**

According to Burton Clark's well-known comparative scheme about the triangle of co-ordination of higher education systems (Clark, 1983), Germany has often been cited as an example for a system in which state authority and academic oligarchy have been the two tra-

ditional main forces, whereas the market and the university management<sup>4</sup> have been rather weak. This widespread perception of German higher education contains a kernel of truth, but must also be differentiated in some details. For example, competition has been well established all along in the sector of research (funding) and partly also in staff recruitment, and the position of the university management has been strengthened since the 1970s. It is also important to realize that the term 'state' in Germany, particularly in the area of educational policy, implies a federalist organization in which the responsibility and influence of the state in the educational sector is assigned primarily at the de-central level of the 16 German states. So, there is also a certain amount of competition among the states.

The strong position of the state and the academic oligarchy can be traced back to the historical roots of the German university. From the beginning, German universities were subject to greater state control (and less church influence) than the other medieval European universities. The first German universities were not founded before the second half of the 14<sup>th</sup> century. In contrast to the earlier universities in Europe, the German institutions were founded mostly by regional sovereigns, sometimes cities, that means by the precursors of the modern state. The influence of the state increased considerably during the 16<sup>th</sup> century in the course of the reformation – the separation between the catholic and the protestant church and the subordination of the church and educational institutions under the authority of the territorial states in the protestant areas – and then during the 18<sup>th</sup> century in the context of German absolutism, in particular in Prussia.

Finally, since the end of the 18<sup>th</sup> century German universities have been treated as state institutions within the responsibility of the regional territories and the later states (*Laender*). The strong position of the academic oligarchy has its origins in the same historical tradition. In the 12<sup>th</sup> and 13<sup>th</sup> century, European universities were established as corporate and co-operative institutions with a collegial organization and a relatively high degree of institutional independence (not of intellectual autonomy in its contemporary meaning), mostly under the protection of the church (Rueegg, 1993). The constitution of the modern German university evolved from the merging of both traditions, the state one and the corporate one. Basically, this dual or hybrid character of the university has continued up to now.

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<sup>4</sup> Another central instance of co-ordination which Clark may have overlooked in his famous triangle.

At the beginning of the 19<sup>th</sup> century, the so called neo-humanist university reform, closely connected with the name Wilhelm von Humboldt, enhanced this dual character of the university integrating its corporative and state side into the idea of the culture state (McClelland, 1980):

- the state as a benevolent patron guarantees the financial and personnel resources of the university, regulates the legal framework and exercises external control,
- whereas the university self-government is responsible for all academic matters and internal affairs.

In this context, the historical signature of **the German university as an academic republic** up until recently could be characterized as a state-privileged and -supported academic republic, based on the self-government of the professors, with a high degree of internal scholarly freedom built up around the concept of a research university. During the second half of the 19<sup>th</sup> century and the first decades of the 20<sup>th</sup> century this concept of the university was the model for reforming higher education in many other countries, e.g. the US and Japan.

Important changes in the governance patterns during the 20<sup>th</sup> century include (1) the widening of the academic self-government to the so called group university embracing all groups of professors (not only the full professors, the ‘*Ordinarien*’) and since the 1970s also the other member groups in varying, distinct proportions (parities), (2) the massive quantitative extension of the complete system since the 1960s in the course of the expansion of higher education together with enormous organizational growth and differentiation, and (3) the stronger involvement of the federal level in higher education policy, legislation and planning also since the 1960s, which has just been reversed through the recent federalism reform in Germany.

The growing need to extend and to modernize German higher education, in particular during the 1960s, necessitated a more active role and a stronger financial involvement of the state. The state no longer confined itself to the traditional role focusing primarily on the legal frame of higher education and the basic budget of the institutions for the otherwise by and large autonomous institutions. One of the reasons for the rising influence of the state lay in its increasing financial and planning involvement in the course of the massive expansion and growth of the sector of higher education as well as in the widespread impression that the higher education institutions did not have the strength and willingness to initiate the necessary reforms themselves. This change resulted in a significant shift from the original balance between state and university in the framework of the culture state towards extensive state con-

trol over higher education. State control and bureaucratic steering have become predominant in nearly all external and internal affairs of the institutions.

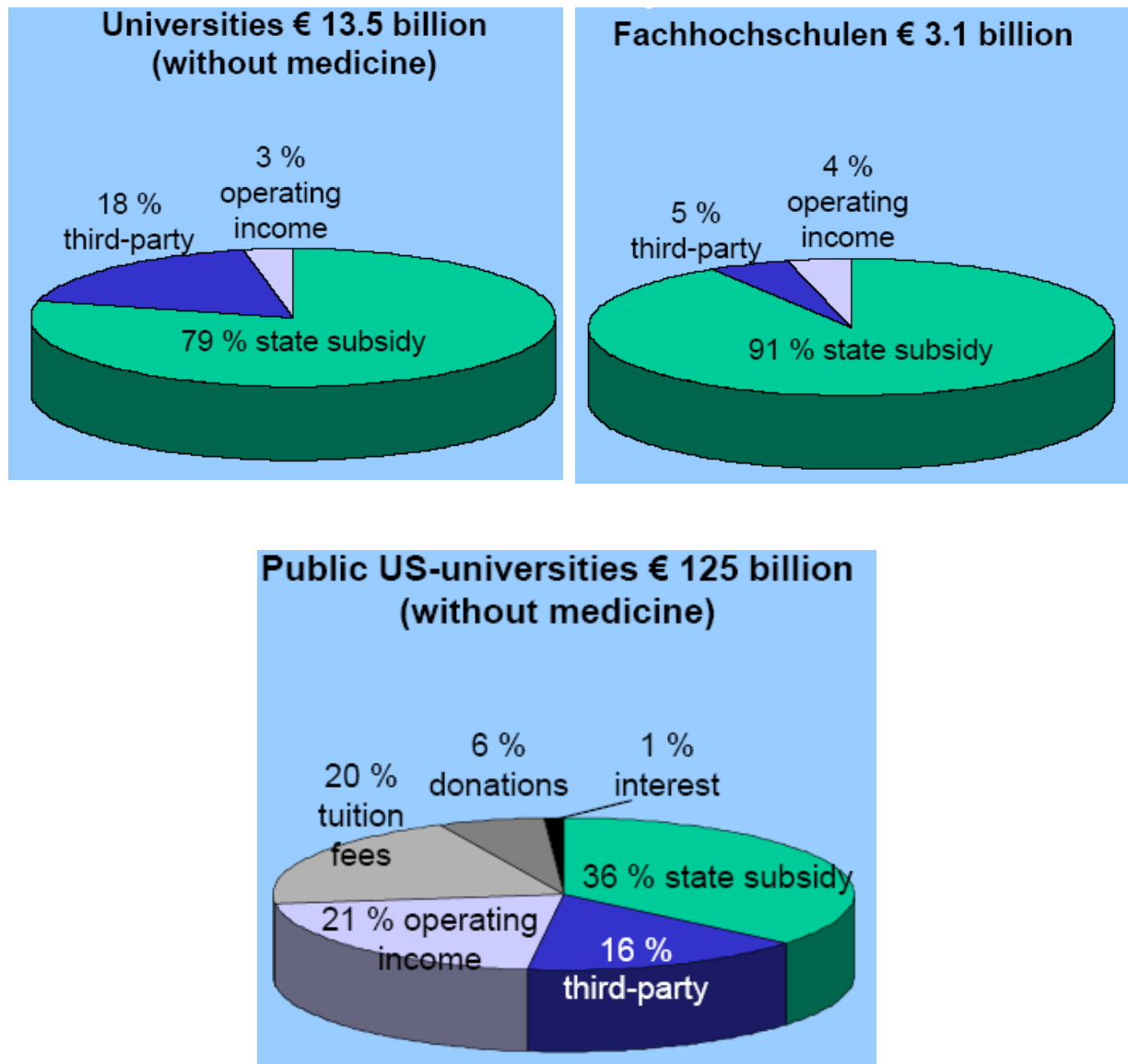
In Germany, the relationships between state and institutions have always been a fundamental policy issue because the private sector in higher education is a rather marginal one and the state provides by far the largest proportion of the universities' budget. *Figure 1* shows the share of private institutions. The number of private institutions has increased considerably over the last decade. Currently, about 30 % of all institutions are run privately. However, private institutions teach only about 4 % of all students in Germany, they attract about 5 % of new entrants. Although about 40 % of private institutions are run by the two churches, industry-based or -affiliated institutions are the most dynamic part in the private sector. These new private institutions are highly selective by strict admission procedures and high tuition fees. They specialize in occupation-related studies rather than research, and most concentrate on business or computer studies.

	Number of institutions	Proportion of new students (in %)		Proportion of all students (in %)	
		1993	2004	1993	2004
<b>Public</b>	262	97,6	95,4	98,3	95,4
<b>Private - church</b>	43	1,4	1,4	1,0	1,3
<b>- others</b>	61	1,0	3,2	0,7	2,3
	<b>366</b>	<b>100 %</b>	<b>100 %</b>	<b>100 %</b>	<b>100 %</b>

Source: BMBF

### **Figure 1: Public and private higher education institutions in Germany**

Another explanation for the strong influence of the state in German higher education lies in the sources of funding. *Figure 2* shows the structure of funding in German higher education, compared with the funding for public universities in the US (Orr, 2007). German universities and other institutions (*Fachhochschulen*) are highly dependent on state subsidies. The proportion of third-party revenues is quite similar in the US and in Germany. The most important difference between Germany and the US is with respect to the other income sources, in particular from tuition fees and other operations.



Source: Orr, 2007.

**Figure 2: Funding of public higher education in Germany (2003) and USA (2000)**

The predominant steering model established during the last decades can be characterized as a mixture of (1) directive and detailed steering by the state authority based on laws, numerous other regulations and the pre-set budget, and (2) internal steering by consensual, oligarchic procedures in the framework of the academic self-government, based on a high degree of personal autonomy which individual professors exercise as a part of their academic freedom.

This traditional kind of governance – at both levels, between state and institution and within the institutions – has come into the line of fire. Both levels have been strongly criticized:



- The state tends to over-control higher education by a proliferation of rigid bureaucratic interventions, so that higher education has become entangled in a net of excessive regulations.
- On the other hand, there is an obvious gap between the high degree of individual autonomy, which professors exercise as a part of their academic freedom, and the under-developed institutional responsibility.
- The university has been more an additive conglomeration of independent players (“loosely coupled system”) than an integrated organizational unit.

These three features are often seen as the most important reasons for the immobility of German universities and the resistance or reluctance to reform higher education after a long period of non-reform. For many, the weakness of the university results from inadequate and ineffective governance structures being unable to cope with new organizational and institutional challenges caused by the massive growth of the complete system as a result of the continuous expansion of higher education since the late 1950s. The state in Germany has consequently had to learn to realign its task spectrum from detailed institutional planning to system-level strategy, and institutions have had to reorganise and restructure themselves to enable them to deal with and positively translate this new responsibility into institutional management and strategy development (Orr et. al., 2007).

### **3 The new governance regime in German higher education**

The reorganization of governance structures in higher education has been supported by the fact that a growing dissatisfaction with the traditional governance patterns has infiltrated not only the sector of higher education but also the complete public sector over the last two decades. The key idea in the policy discourse for this reform movement is the concept of new public management (NPM). The transfer of this concept to higher education institutions is usually called the implementation of the new steering model (NSM). NPM is a concept of state modernizing which moderately transfers steering models of business administration to public institutions and organizations. The objective of NPM is, firstly, to substitute the bureaucratic organization of public administrative action for a more service oriented view of public institutions and management oriented steering patterns. Secondly, NPM intends to raise the effectivity and efficiency of public institutions by a more economical use of public resources.

NPM intends to balance out growing tasks and demands for public achievements with meager public funding and increasing effectiveness. However, NPM and the NSM do not aim to reorganize public institutions completely in accordance with market rules. Debates on higher education should overcome the dichotomy of state versus market coordination. Reforming the governance structures of higher education does not intend to replace state by pure market regulation. Rather it is intended to balance out the relationships between state and institutions with market principles such as competition, incentives and measurable performance as intervening means. In this meaning NPM is often seen as a ‘third way’ between state and market. For this purpose NPM has developed several steering strategies and procedures which form what is called the NSM in higher education policy (Ziegele, 2002; Nickel, 2007).

There have been several attempts to systemize the components of the NSM. According to Ernst Buschor (2005) the new steering model embraces following elements:

- (1) deregulation: from state to institution
- (2) more competition between institutions
- (3) high degree of institutional autonomy in financial, organizational and personnel affairs
- (4) decision-making by persons and not by committees
- (5) quality and incentive oriented steering
- (6) continuous evaluation and accreditation
- (7) block grants with objectives and pre-set performances
- (8) contracts with guidelines for targets and costs
- (9) transparency by monitoring and full-cost accounting
- (10) flexibility of employment conditions (e.g. payment).

The current change in the governance structures in German higher education can be pointedly characterized as the transformation of the old culture state model into the new steering model – or as the transformation of the traditional academic republic into a new type of managerial university. The following diagram (*Figure 3*) shows (1) the most important instruments of state control in the framework set up by the new governance model, (2) the obligations the university has with respect to the state and, finally, (3) some of the new intermediate institutions located between university and state which take on some of the control functions previously carried out by the state in the old governance regime.

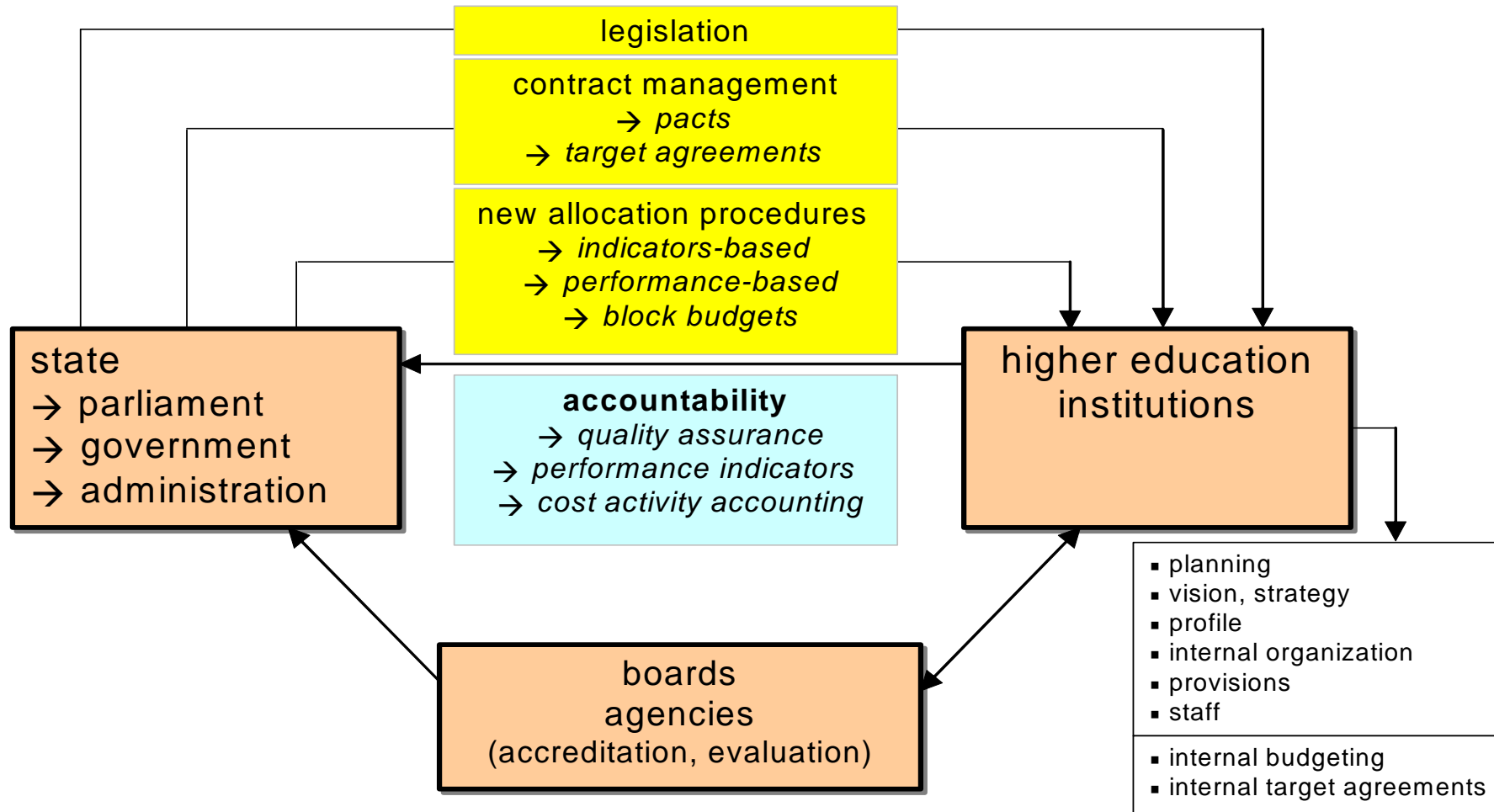
### **The level between state and institution: external steering**

Also in the new governance model, the state maintains the responsibility for legislation and the budget right (at least for the state share), both of which belong to the core responsibilities of the state(s). Additionally, two main groups of new steering procedures have been established in this framework: different forms of contract management and new procedures of funding and allocation. At the level between state and institution two *main types of contract management* have been introduced:

- pacts (*Hochschulpakete*): statewide contracts or agreements between a state government and all higher education institutions,
- target agreements (*Zielvereinbarungen*): agreements between a state government and a particular university.

Such contracts or agreements should specify the strategic objectives of further institutional development (“management by objectives”) rather than the particular measures and the financial incentives and resources by means of which the agreed targets should be realized or the institution should be rewarded if the goals are achieved. The conceptual differentiation between these two types is often a little bit confusing because the use of the terms varies among the German states (Koenig, 2006). Usually, pacts refer primarily to the level between one of the German states and all universities within this state, whereas target agreements are individual contracts between the state and a particular institution.

Actually, contracts and target agreements are instruments for the strategic steering of institutions or organizations (Ziegele, 2006), not primarily for budgeting and allocation. Of course, they can also include a funding component, e.g. as an incentive for the realization of the goals which have been negotiated and fixed in such contracts.

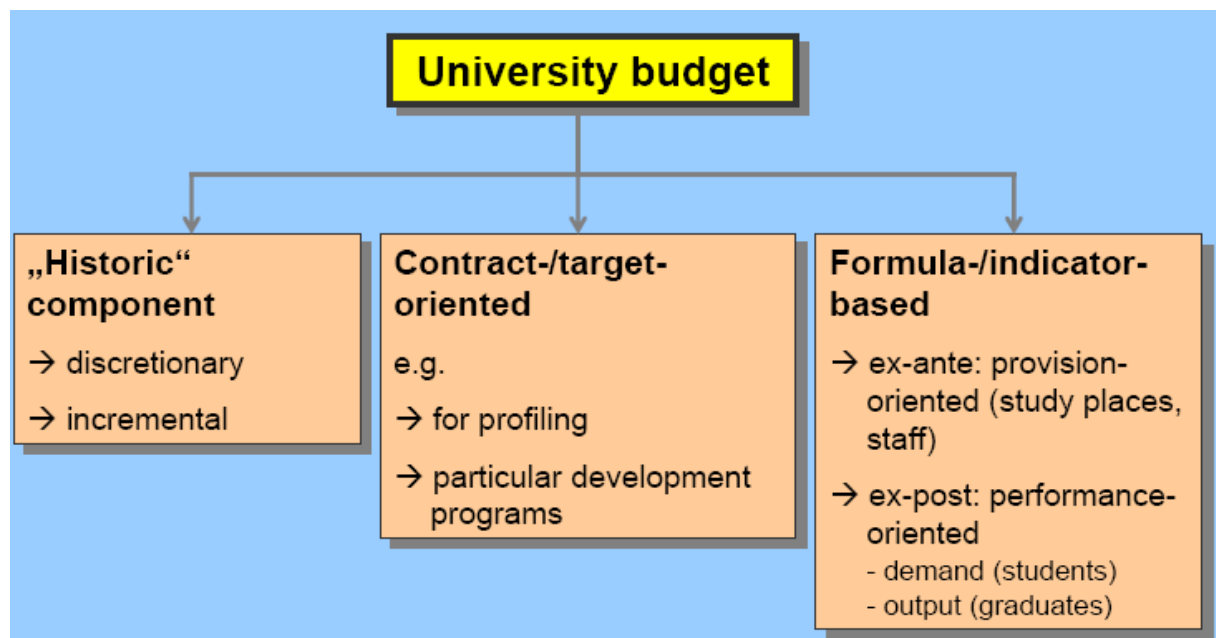


Partly based on Ziegele (2002)

**Figure 3: The new governance regime in German higher education**

Additionally, there are several *innovations in the procedures of budget allocation* at the level between state and institutions (Leszczensky, 2004).

- *Lump sum budgeting*: In the meantime, in most German states strictly cameralistic forms of budgeting have been replaced by more flexible ones, primarily one-line budgets.
- *Distribution procedures*: In most German states, the traditional discretionary-incremental procedure<sup>5</sup> of budgeting has been replaced (in some states will soon be replaced) for formula-based procedures of funding and allocation at the level between state and institution. Allocation methods can be utilised to stimulate universities into more competitive behaviour (Orr, 2007). In Germany, state subsidies tend not to be allocated as a single block, but comprise different components. Each of these components is characterised by a different steering approach and a different degree of competition.



**Figure 4: Budget allocation between state and universities**

<sup>5</sup> ‘Discretionary’ means: the budget is at the discretion of the state not linked with the output of institutions; ‘incremental’ means: the budget is projected annually and raised by a certain amount, e.g. to take account of inflation.

Usually, there are three different procedures (*Figure 4*).

- *A formula- or indicator-based part:* This component is based on the measurement of particular indicators, mostly automatically by means of a formula. The indicators can refer either to demand- or to performance-oriented variables. Such allocation procedures represent the most direct form of competitive institutional budgeting.
- *A contract- or mission-based part:* Parts of the budget can be designated in order to realize politically important objectives or programs for the further development or the profiling of the institution (e.g. further internationalization, gender equity or continuing education).
- *An incremental-discretionary part:* This is a rather non-competitive component of budgeting because the procedure carries forward the previous annual budget modified mostly only by a moderate amount. This component provides a certain financial stability for institutions and protects them against massive budget cuts.

Reforms of funding in German higher education have concentrated on indicator-based procedures of allocation since the 1990s. During the last years, these methods have been complemented by contract- or target-oriented components. Among the 16 German states there is a colourful mixture of these three components, each weighted differently. However, incremental and discretionary parts still dominate allocation decisions in many German states.

### **Internal institutional steering**

Not only at the level between state and institution but also within institutions universities have implemented new instruments of allocation, often with the expectation that allocation can also be an instrument of internal strategic steering, a lever for institutional changes or an incentive for increasing academic performance. Up to now, the most common methods are internal target agreements, e.g. between central level and level of faculties, and internal indicator- or performance-based allocation procedures. This is often accompanied by a decentralization of budget responsibility and an enlarged responsibility for making decisions on allocation at faculty level.

## Accountability and intermediate institutions

Increased institutional accountability with respect to the state, the public and society is often seen as the necessary response to the extended autonomy of universities in order to evaluate and justify the considerable public investment in higher education. Both, more autonomy and more accountability, mesh together. Different forms of accountability have been institutionalized in Germany:

- a continuous monitoring system at institutional level (e.g. teaching reports), based on quality assessment, evaluation of instructions and outcomes and financial controlling,
- the foundation of particular external agencies of accreditation, which shall guarantee minimum standards, and evaluation,
- and the establishment of boards as independent organs of supervision and, sometimes, also decision instances for the universities (e.g. for the selection of the top management).

To sum up the new steering model in German higher education, one could characterize the new governance structures – some of which have already been implemented, others are still in a planning stage – with the term **managerial university** (Amaral et al., 2003). This concept should emphasize five important traits of the new governance model:

- deregulation: the shift from governmental to institutional level in the field of allocation, staffing, curricula, admission etc.
- strengthening of the executive functions of the university management inside the university
- the shift in the authority structure of the university from the scholarly to the management level and the emergence of a new managerial class
- the change in the role of the university management from supportive achievements in administration to active steering of the complete institution covering also the academic domain
- increasing emphasis on the economic rationality of the university: efficiency, fundraising, fees, incentives, indicators, public-private-partnerships etc.

#### **4 The current state of implementation: some empirical findings**

Between 2004 and 2006, HIS Higher Education Information System carried out four empirical studies about the implementation and the mode of operation of the new governance model at state and institutional level (Leszczensky & Orr, 2004; Behrens et al., 2006; Jaeger et al., 2005; Jaeger, 2006a). The following remarks are based on results selected from these studies. The general situation can be described as an advanced stage in the process of converting the old into the new governance model. But the process is still far away from completion, it is ongoing. Differences exist not only among the German states but also among institutions. Such differences concern the detailed architecture of the steering model(s) as well as the speed of implementation. However, the direction and the dynamic of change are emerging very clearly.

##### **Statewide pacts between state and institutions**

Pacts – often with a duration up to ten years – have become an important instrument of external steering. In nearly all German states the government has arranged such contracts with the universities – often under different, sometimes euphemistic names such as solidarity, quality or innovation pact, optimization program etc. Of course, there are some differences in the way the states develop and implement these instruments. For example, the length of a contract or a pact varies, as well as the obligatory character and the areas – from funding, staff planning, research activities and study provisions to substantial goals for the further development of institutions.

With regard to contracts or pacts between state and institutions the current state of development is fairly disillusioning. From the institutional viewpoint such contracts are very fragile constructs. They are not obligatory for the partners, in particular they do not bind the state to keep the agreed commitments – e.g. because of the budget rights of state parliaments or financial reservations of the government. A very prominent university chancellor recently commented on this point that the short history of pacts is already a history of broken promises (Seidler, 2005). The main reason for this fragility is that in nearly all German states a policy of strong reductions in the expenditures for higher education is being effected. Currently, German higher education is subject to considerable cuts in public funding as a result of the massive crisis in public finances and the cutback in public tasks and functions.



In most German states, including the prosperous ones (like Bavaria), a policy of reducing the budget, staff, the number of study places or other parts of the infrastructure of higher education institutions is being carried out - including closing courses of studies, faculties or smaller higher education institutions or even merging complete universities. Institutions are confronted, on the one hand, with rising demands and expectations with respect to the outcomes, they should achieve more (more graduates, quality, research) but, on the other hand, within a reduced frame of available resources. Hence, contracts between state and institutions do not protect the universities against permanent state interventions and substantial budget cuts. The objective of this kind of contract management, to give the universities more reliability in planning and a medium- or long-term perspective for further institutional development, has not been able to be achieved so far.

### **External target agreements**

Apart from statewide contracts, in many German states there are additional target agreements between the state and an individual institution. They all involve specific agreements about the future structural development of a particular institution, some of them also about the financial and personnel resources of the university. Often, the state has proved to be very unimaginative because such target agreements pursue all the same objectives and utilize the same key ideas and indicators for all institutions. Instead of more differentiation and profiling such strategies produce more homogeneity because all institutions have to follow the same partly trendy norms, criteria and standards – a special case of “mimetic isomorphism” (Schimank, 2006, p. 11).

The legal character of such agreements varies among the states. But similarly to contracts, a lack of obligation is typical for this steering instrument (Koenig, 2006). Such contracts as well as internal target agreements are often regarded as reciprocal arrangements with mutual rights and duties based on negotiations between different partners but of equal rank. However, this ideal does not work in reality, probably it is not the intention of the concept at all. Rather there is an asymmetrical relationship between the two sides, between state and institution as well as within the institution between central and decentral level. At both levels, one side has the budget at its disposal, whereas the other side is responsible for the evidence of the outcomes.

### **Allocation of the budget between state and institution**

12 out of the 6 states have already introduced formula-/indicator-based procedures of allocation at this level. Two of these (Berlin, Bremen) focus on contracts as the main steering instrument and attach only a complementary importance to formula procedures. The others implement indicator models with the goal that these models should operate as the central instrument of budgeting. The proportion of state subsidy, allocated on the basis of formula or indicators, varies considerably among the German states. It ranges from 2 to 95 % of the complete budget. Three states (Brandenburg, Rheinland-Pfalz, Hessen) utilise formula-based allocation as the main method.

The current importance of the second procedure, the contract- or target-oriented component, is very low. Only a few states practise this procedure, and only in a very small proportion. So far, the incremental-discretionary component remains predominant in most of the German states. Until now, all of the implemented indicator models focus on teaching rather than research. Although half of the states take research indicators into account, they award such criteria only a very small share, a maximum of 8 % of the budget. There may be two reasons for this, firstly, the political emphasis placed on teaching, secondly, the experience that performances in teaching are more easily measured and documented than in research.

Apart from teaching and research, many procedures use in addition such indicators as the internationalization of studies (e.g. the number of foreign students) or gender equity in staff recruitment, but only in a small proportion. The most commonly used indicators for teaching are the number of students (within the regular duration of studies) and the number of graduates. In most states, the number of students is the variable with the highest weight, to which more than 50 % of the flexible part of the budget is allocated. For research the most common indicators are the volume of third-party funding and the number of doctorates. The inclusion of such criteria as the number of publications or citation indices is very rare.

Therefore, two categories of indicators can be distinguished as two different steering instruments: indicators for demand-oriented steering, such as the number of first-year students, and indicators for success-oriented steering. With the construction of such a performance oriented procedure of allocation, it is assumed that such indicators could operate as incentives. Not all

of these indicators encompassed in the allocation procedures are directly performance-oriented. E.g., under the specific conditions of access and admission in Germany, student demand is not really a performance indicator. Although in four states more than 80 % of the budget is indicator-oriented, only a very small proportion of about 10 % is actually based on performance.

In those states that use indicator-based allocation procedures, the rationality of this procedure depends on the availability of valid data and the performance and competition reference of the indicators. Often the institutions are protected against massive fluctuations in the size of the flexible part of the budget by means of either certain limitations in the extent of possible cuts (so-called *Kappungsgrenzen*) or by taking average performances over a longer period of time as the basis of allocation. The comparison of subjects with different traditions and cultures is often very difficult. Most of the new allocation models differentiate between several groups of subjects with subject related cost-norms.

The main issues, concerning the development and implementation of such new concepts of allocation between state and institution, include not only the different architectures (that means the criteria, methods and weighting) of the utilized models. Even more important is the issue of whether the selected set of indicators is able to depict the complete or at least the central spectrum of objectives and functions of higher education. Mostly, the indicators prefer the quantitatively measurable dimensions of institutional achievements and ignore the more sophisticated qualitative aspects. In the long run this may change the standards or criteria of academic meaning and significance in a way which will affect the mission of the university. The mission of the university as an institution to produce (by research) and to distribute (by teaching) innovative theoretical and empirical knowledge and to promote the further development of rational knowledge is not substantially reflected in such models.

### **One-line budgets**

In the meantime, half of the German states with a little bit more than 50 % of all universities allocate the budget of the institution as a lump sum with a high degree of internal flexibility, limited only by legal regulations or collective agreements (Behrens et al., 2006). A further 30 % have a more flexible budget with the flexible part being more than 50 %. Only 20 % of institutions located in four states are still confronted with a budget model which allows only

less than 50 % flexibility. In particular those universities with a one-line or at least with a not completely fixed budget use formula- or target-based procedures of internal allocation. The conversion of line-item into one-line budgets has strengthened the influence of the central university management considerably.

### **Internal allocation and internal target agreements**

The implementation of formula-based allocation models within the universities - primarily at the level of faculties – has reached an advanced state in Germany. Nearly 90 % of all German institutions use such procedures for internal allocation, the rest will introduce them in the near future. The use of target agreements as an internal budgeting instrument is not as widely spread as that of formula models (Jaeger, 2006 a, 2006 b). Up to now, only 30 % employ target agreements for budgeting. But another 28 % intend to introduce such agreements in the near future. Larger institutions and those with one-line or at least more flexible budgets tend to use these new internal steering procedures more frequently than smaller institutions or those with a pre-set budget.

All institutions that use formula procedures include the running costs, but only 10 % the personnel budget. Compared with that, target agreements are used more frequently - 64 % - also for personnel allocation. However, the share of the complete institutional budget which is distributed by these new instruments among the faculties is very low, on average 4 % with a maximum of 11 %. So, the relevance of these models for the faculties is quite marginal. Concentrating only on the share of (ex-post) performance-based indicators, i.e. without ex-ante indicators such as the number of staff, the budget relevance of indicator-based models is even lower: For most of the universities, the indicator-based share is below 3%.

With regard to the selection of indicators for internal procedures, there is a general homogeneity between the adopted models, which are used at state level and internally. On both levels, the same set of standard indicators is applied. Performance-dependent indicators tend to dominate. Furthermore, there is a higher emphasis on teaching than research indicators. As in state-level models, the majority of universities focus on student numbers and the number of graduates as indicators for teaching and on the volume of third-party funding and the number of doctorates as indicators for research. Also indicators for the degree of internalization and for gender equity are used internally.

There are two direct relations between state and university funding allocation models. Firstly, universities in states with an indicator-based funding model tend to apply such models for internal purposes more frequently than universities in states without indicator-funding. Secondly, in most states the relationship (concerning the architecture of the models) between their internal funding models and the respective state procedures is very close. But there are exceptions. In a few states the allocation systems of some universities differ considerably from the state systems.

Critical questions raised concerning the internal use of these new procedures include: The links between targets, means, incentives and sanctions are often not really clear. Achievements and services in return are often connected only in a vague manner. The attribution of performances and achievements to causes and conditions is often unclear because of its multi-causality (e.g. drop-out rates or duration of studies, often used as indicators, are not fully at the action horizon of a particular university). Often contracts and agreements do not specify the ways of evaluation and assessment of target realization. With respect to the very low budget proportions allocated by these instruments the actual steering effects and the incentive relevance of the indicators for the budget are not really clear. The procedures and indicators focus on quantities or quantitative performances and usually neglect the more qualitative dimensions.

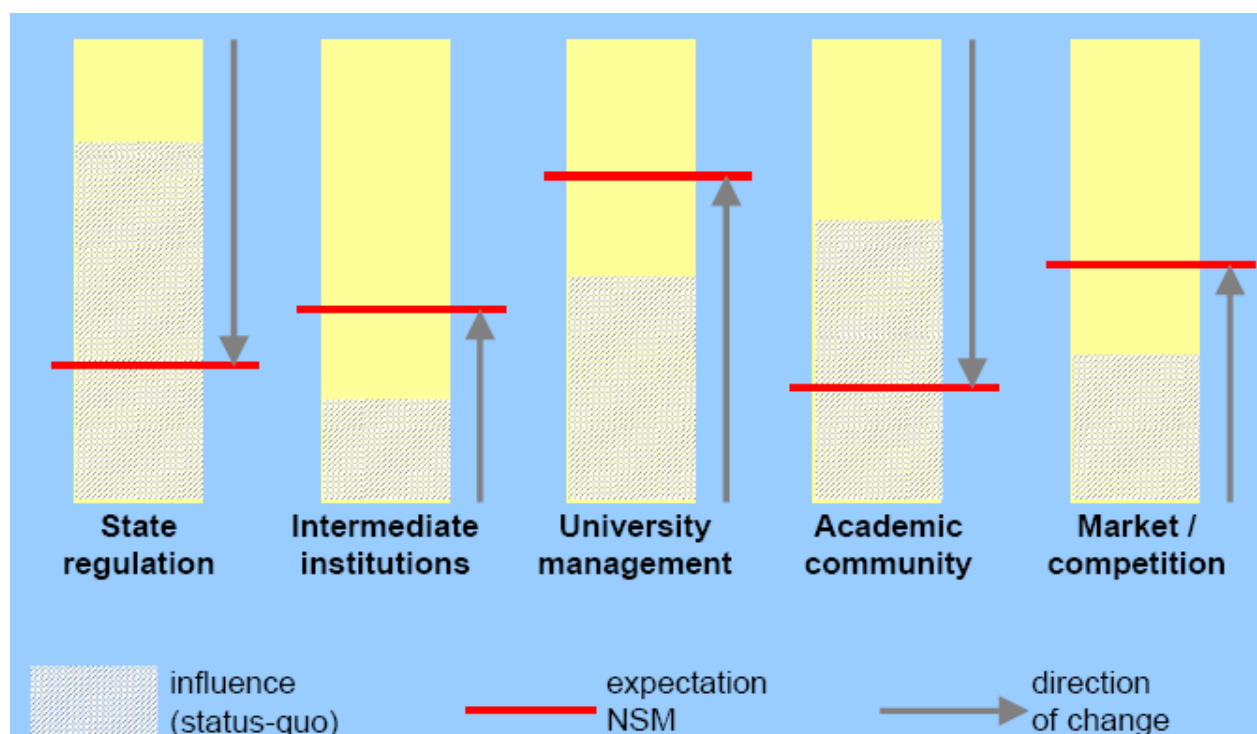
## **5 Conclusions**

Although there is obvious progress in the implementation of the new steering model, it can be stated that many steering and allocation procedures on state as well as on institutional level are very new, so that the situation can be characterized as still in a phase of experimentation. The current state of implementation varies between the German states as well as between institutions. The 16 states have taken partly divergent routes, preferring different models or combining certain elements and procedures in a specific way. Furthermore, the institutions have also responded differently. The university management seems to have adopted the NSM actively as a chance and as an instrument to restructure and reorganize universities – e.g. by strategies of profiling, closing or opening courses of studies or faculties, establishing new research areas and so on.

Contract management and target agreements are often connected with the notion that they can take on the function of an interactive participatory management instrument. However, in the last instance such agreements have turned out to be hierarchical instruments in which the balance of power cannot be guaranteed to any extent. The instrument of target agreement in practise has often been transformed in a new top-down routine which is applied as a bureaucratically formalized procedure rather than as a participatory strategy of institutional planning and development.

Despite the contract rhetoric there is no mutuality between bottom-up and top-down. Rather there is a hierarchical, asymmetrical relationship between state and institution as well as within institutions between central and decentral level. This is true for allocation decisions as well as for external and internal target agreements. These instruments may be suitable for hierarchical organizations with metrically measurable outcomes, but only in a limited extent for academic communities. These have, historically, been based on the idea of “intellectual curiosity”, that means a more complex intellectual mission containing often not directly measurable cognitive achievements.

The implementation of the new steering model will probably result in a significant change of the academic identity of the university. The standard or the criterion for meaning and significance is changing. The quality of academic work is now not primarily a matter of increase or progress in knowledge but of measurable performance based on indicators and other characteristics – something like a “ton ideology” (*Tonnenideologie*). Scholarly productivity and creativity do not directly respond to the economic logic of incentives and output steering. The crucial question is whether the new steering procedures will have any benefits (or which benefits it will have) to the productivity of research, the quality of teaching and the competence level of graduates.



Partly based on Lange (2005)

**Figure 5: From the academic republic to the managerial university**

To illustrate the changing governance structures in German higher education, *Figure 5* shows the direction of change in a pointed way. The influence of the state, so far the predominant instance, will decrease in favor of, primarily, the central university management. The implementation of this instrument is part of a significant shift in the authority structure of the German university – the redistribution of influence from the academic community, of course often with oligarchic traits, and the individual scholar to the university management at both levels. The new class of executives as a distinct group in the academic field seems to be the actual winner of the new steering model.

It is remarkable that the policy debate about the new steering model focuses primarily on organizational and instrumental issues. A parallel or connected debate about the changing mission of the university under the auspices of the knowledge based society does not take place (Kwiek, 2006). Consequently, the relationships between the mission and the organizational patterns are completely missing in the discourse on the development of German higher education.

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