

# The Institutional Structure of the German University<sup>1</sup>

## I On the Concept of Institution

The following paper will try to demonstrate that “the German University” is more than only the name for the universities in a specific region of world society. Instead the German University is supposed to be an institution of its own with a significant institutional consistency and continuity which allows it to be analyzed as a kind of model and to be compared as such to other historical types of universities.

But what does the concept of institution mean in sociological terms? The understanding which is in my view the most meaningful defines institution as the *convergence of the expectations of many observers*. There are expectations directed towards a specific societal practice and if you happen to meet someone who does not share the respective set of expectations you do not resign yourself to the resulting deadlock but you appeal instead to the expectations of arbitrarily chosen third persons of whom you postulate that each of these third observers will necessarily share your interpretation of the situation.<sup>2</sup> In other terms this understanding means that a normative interpretation is given to the respective expectations. Even if the expectations are frustrated by the behaviour of some actor one nonetheless clings to the expectations against this resistance.

A university system then consists from a population of such institutional rules. And the historical development of a university system and the historical change in it imply changes in the underlying population of institutional rules and routines.<sup>3</sup> Among such changes are disappearances, transformations and novelties in expectations and rules. It is obvious that such a kind of approach approximates our understanding to evolutionary theories of institutions.

## II The German University System (17<sup>th</sup>-21<sup>st</sup> Centuries)

The historical unity this essay will look at is the German university system from the 17<sup>th</sup> to the 21<sup>st</sup> century, a period in which the consistency and continuity of the properties of the system and of its elements which we need for our argument can be observed. One potential starting point for the somehow self-contained period we are going to study is the foundation of the University of Halle (Brandenburg-Prussia) in 1694 which can be seen as the first modern German university. In Halle many of the properties which will be mentioned in the following discussion were introduced for the first time.<sup>4</sup> The final point for our argument is naturally the present-day situation which can be characterized by the “Excellence Initiative” (2006-7, second phase starts in 2010) of the German Federal Republic which tries to identify “clusters of excellence” and “concepts for the future” in German universities and to give

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<sup>1</sup> Paper written in 2007, revised in May 2010; publication in Chinese and Catalan in preparation.

<sup>2</sup> Cf. for this understanding of institution Luhmann 1972, Vol. I, Ch. II, 4. The concept of the “third observer” is the decisive insight in this proposal.

<sup>3</sup> This argument refers to the most influential evolutionary theory of economics and organizations, Nelson and Winter 1982; cf. Nelson and Winter 2002.

<sup>4</sup> Cf. Stichweh 2008.

intensive support to those universities who qualify in these respects.<sup>5</sup> The excellence initiative is based on a clear understanding that the German university lost its leading position in international terms which it had from 1750 to 1933, and that something should be done to regain it.

The decentralized political landscape in Germany was always responsible for the fact that a considerable number of universities existed in Germany: 1789, at the beginning of the French revolution, there were 34; from 1815 to 1914 the number was 20 or 21; and today - depending on how many of the private foundations of the last twenty years you are willing to count as universities - there exist between 88 and 110 universities in Germany.<sup>6</sup>

In former centuries only a very small part of the population entered university studies: In Germany around 1700 2% of the male population participated for some time in university studies. Around 1800 this percentage had dropped to around 1%<sup>7</sup> (this development probably reflecting an improvement of gymnasia so that universities had no longer to substitute for gymnasia and other types of secondary – sometimes even primary - schools). In the eighteenth century there were no female students which only begins to change around 1900. Two hundred years later around 25 to 30% of each male and female age group become university students.<sup>8</sup> If one includes other types of higher educational institutions and those students who only enter higher education some years after secondary school the numbers approach 40%.<sup>9</sup>

The total number of students in the 34 universities on the territories of the later German Reich was around 7.900 in 1789. Of these students 40% were concentrated in Halle, Göttingen, Jena and Leipzig, each of them counting between 800 and 1000 students. The other 30 universities had an average student population of around 150.<sup>10</sup> Two hundred years later the whole student population has grown by a factor of around 200 to 1.4 million university students.<sup>11</sup> As the number of universities has only grown by a factor of 2.5 this means that *the average university is around a 100 times bigger than it would have been in 1800* (growth from 150 to 15.000 students as the average student population). In the Winter 2006/07 this means for the ten biggest German universities that their number of students is in a range from 45.000 (Cologne) to 32.000 (Dresden). In terms of size this signifies that the distribution is much more continuous than it was in 1800, no really big universities dominating the system. The other main observation is the enormous growth of the student population in the system. We will have to ask which other features of the system are influenced by this.

### III Institutional Rules: State Institutions

The German university normally is a state institution. It is erected, financed and controlled by a state, and among the institutions and the personnel of control there often were some – one

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<sup>5</sup> See <http://www.wissenschaftsrat.de/arbeitsbereiche-arbeitsprogramm/exzellenzinitiative/>.

<sup>6</sup> Universities which are allowed to confer Ph.D. degrees. There are 88 state universities and 22 private and church universities (see <http://www.hochschulkompass.de/hochschulen/statistik-hochschulen-nach-traegerschaft-und-bundesland.html>; data by May 21, 2010). There are some other private institutions who are not yet allowed to confer Ph.D. degrees.

<sup>7</sup> See for these figures Frijhoff 1979, p. 212.

<sup>8</sup> Statistisches Bundesamt 2007a, p. 10. In 2005 and again in 2007 the percentage is 37% (but this includes students at „Fachhochschulen” = “Universities of Applied Sciences”).

<sup>9</sup> Cf. Statistisches Bundesamt 2009.

<sup>10</sup> Turner 1987, 221.

<sup>11</sup> 1.415.503 University students in the winter term 2009/10, to which 704.000 students in “Fachhochschulen” and other higher educational institutions can be added (Statistisches Bundesamt, 2010, 6).

can point to university curators in 18<sup>th</sup>-century Germany and some ministers in 20<sup>th</sup>-century Germany – who belong to the most innovative reformers in the history of the system. The close coupling of university and state can be seen in the typical occupational and professional futures of university students: first of all the university planned for state careers and it only reluctantly accepted other professional outcomes.

This close coupling of university and state in the 17<sup>th</sup> and 18<sup>th</sup> century situation meant that the plurality of universities was coupled to the plurality of states – in this historical situation there still existed hundreds of disparate territorial units of which only some could claim a university of their own. Today there are 16 “Länder” in reunified Germany – none of them without at least one state university. On the other hand Germany does not have a university tied to the federal state and thereby evades the disparities which could go along with this.<sup>12</sup>

Whereas in the United States the history of higher education is at the same time the history of institutions related to churches and other confessional groups, in Germany the state-centeredness of universities always weakened confessional links although the catholic/protestant split was prominent in the early modern situation (16<sup>th</sup> to 18<sup>th</sup> centuries) and was then relativized by cosmopolitan universities like Göttingen who tried to be attractive to both sides of the confessional split. Today the only catholic university is at Eichstätt (combined with Ingolstadt); all the other state universities being confessionally neutral.

A last important point is the relative weakness of private universities in Germany. They still only include 0.9% of all university students (but they are more important in the sector of universities of applied sciences). Only five of the private universities have more than 1.000 students.<sup>13</sup> They are highly specialized, often on only one subject and characteristically on business subjects, and many of them do not seem to have a sound financial basis. Therefore a competitive situation between private and public institutions is highly improbable in Germany in the coming years. Otherwise there accrues a certain experimental role to private universities, especially in curricular and didactic respects. They can attract some prominent scholars, either early or late in their careers (normally you can't go on in Germany after 65 years), and that may give them a certain visibility.

#### **IV Institutional Rules: State Finance**

A corollary of the state centeredness of the German university is that it is mainly financed from the state budget. In contradistinction to the American university it is not based on a diversity of financial sources. Student fees were not known until recently. For some years now students in some regional states have to pay 500 € per semester. What is not changed by this is that student fees are not a strategical part of the planning of university development.

But even in German universities a renewed interest in private donations as a part of university finance is to be observed in the last few years. There was a prominent role for private donations in the years before and after World War I, especially in the newly erected city

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<sup>12</sup> There are, of course, two exceptions, the two universities of the German military: the “Universität der Bundeswehr, München” and the “Helmut Schmidt Universität, Hamburg”.

<sup>13</sup> The “Steinbeis Hochschule Berlin” (4002), the „European Business School, Oestrich-Winkel“ (1295), the „School of Finance and Management Frankfurt” (1207), the “Jacobs University Bremen” (1199), the “Universität Witten-Herdecke” (1037) – most of them with a clear business focus (see Statistisches Bundesamt 2010, 30-32).

universities in Cologne and Frankfurt. This practice which was coupled to the societal integration of Jewish families and to the accumulation of wealth in these families was discontinued in the 1930s at the latest. Slowly some features from this period are reactivated. The University of Frankfurt which owes its existence to these early 20<sup>th</sup>-century trends has succeeded to become a foundation again to become financially more autonomous and to become more attractive to donors. This programmatic focus on fundraising is to be observed today in many German universities, as it is in other European countries. But until now no German university succeeded in collecting an endowment which is significant in relation to the total university budget.<sup>14</sup>

## V Institutional Rules: Autonomy

The most important rule which functions as a kind of basis of the German university may be *autonomy*. The oldest term for autonomy in the historical semantics of the German university is “academic freedom” (“*libertas academica*”) which first of all meant freedom from external intervention.<sup>15</sup> In the 17<sup>th</sup>/18<sup>th</sup>-century situation “academic freedom” signified the postulate that political and police authorities have to refrain from direct interventions into school life and that they have to respect an autonomous academic jurisdiction in universities and in some other types of schools.

From this political-jurisdictional interpretation of academic freedom the German university switched in the 18<sup>th</sup> and finally the 19<sup>th</sup> century to an intellectual interpretation. Academic freedom now meant the interrelation of teacher and student roles and pointed to the intellectual freedom conceded to both sides of this interrelationship: For university teachers it was the freedom to teach (“*Lehrfreiheit*”) which since the foundation of Halle implied that you are free to choose from a broad range of subjects and different ways to treat them depending on the direction your scientific work takes. Regarding students the complementary freedom was the freedom of learning (“*Lernfreiheit*”), giving them the right not to be bound to a closely defined school curriculum but navigating instead an individual way through a complex plurality of academic offers. From this point of view one easily sees what a strange innovation the Bologna model is if one relates it to the German academic tradition.<sup>16</sup>

There arises a further interpretation of academic freedom which is closely tied to the development of political freedom in the transformations of statehood in German history. Academic freedom sometimes became a substitute for political freedom. In a country which did not belong to the forerunners of the Western liberal political tradition the restrictiveness of life in the authoritarian and small states of Germany suggested an interpretation in which the university could be perceived as the most important institution of freedom where inner attitudes were socialized which allowed to hold to one’s inner intellectual freedom under provincial and politically restrictive circumstances.

A last point is that these concepts of academic freedom were closely tied to migrations in the academic space. Only if teachers and students could freely move around between all the universities in the German academic space it became probable that restrictions on academic freedom could not be institutionalized, as restrictions would motivate many students and

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<sup>14</sup> On the functional significance of endowments cf. Hansmann 1990.

<sup>15</sup> See on „academic freedom“ Stichweh 1994b, Ch. 13.

<sup>16</sup> I do not include a discussion of Bologna into this paper. See for the beginnings of a sociological interpretation Stichweh 2010.

teachers to move to another place. Then the institutionalization of new liberties would attract both categories towards the place where autonomy is enhanced this way. The success story of Göttingen which only a few years after its foundation in 1737 became probably the best university in the world from ca. 1750 to 1780/90 is a good illustration of this last point. This interrelatedness of universities via migrations still is one of the reasons why German universities constitute a relatively egalitarian space in terms of scientific achievements. Probably even the excellence initiative will only marginally change this.<sup>17</sup>

## **VI Institutional Rules: Education**

The German university with its prominent focus on autonomy and freedom did not understand itself as an educational institution. The student was perceived as an adult to whom freedom could be imputed as a normative expectation. Self-reliance and a strong concept of individuality with an extensive philosophical, literary, but even sociological background were further components of this semantic complex.<sup>18</sup> Some historical and structural reasons for this distance towards education and educational ideals are easily to be seen. The nobility did never play a prominent role as a public of German universities, whereas educational ideals in other countries were often coupled to the urgent need of giving some education to the children of the nobility. Furthermore there were no Colleges in Germany, no institutions which combined living and learning in a collegiate environment – and again Colleges are a privileged place for formulating educational ideals in higher education.

Since the romantic period in 19<sup>th</sup> century Germany there arose a new educational ideal in universities: “Bildung”. But what was meant by “Bildung” is easily seen in all attempts to find an English equivalent for this German term. Most translators either opt for “self-cultivation” or “self-formation”, and what is interesting is the reflexive component “self” in the meaning of “Bildung”. “Bildung” always seems to be something which is done by the respective system in a relationship towards itself. And then at its semantic core the concept of “Bildung” formulates a further interrelationship, an interrelationship of individuality and world, and this interrelationship is obviously not mediated by (the educational practice of) teachers. At best it may be *stimulated* by teachers who make visible for their students their own interrelationship of individuality and world and who may this way support parallel efforts by students.

## **VII Institutional Rules: Science**

The University is first of all an institution of scientific knowledge. This feature is more prominent in the German case than in any other university tradition. But this German understanding is on the other hand based on a very inclusive concept of “science” (“Wissenschaft”). “Science” includes law,<sup>19</sup> theology, the humanities, the sciences, and the 19<sup>th</sup>-century latecomer, the technical sciences. To this inclusive understanding of science corresponds a kind of structural preference for the comprehensive university (“Volluniversität”) which demonstrates an encyclopaedic concept of the university, meaning that a university should have disciplinary representatives of every relevant knowledge type. From this structural preference may be derived the prognosis that specialized universities try to become full universities over time. This could be observed in the historical rise of the

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<sup>17</sup> Cf. the papers in Kaube 2009.

<sup>18</sup> Cf. Stichweh 1994b, Ch. 9.

<sup>19</sup> See for a case study Stichweh 1992.

technical universities in Germany (as well as in the United States) which established a symmetrical position for the two higher educational types, in the German case in our days even a certain preponderance of the leading technical universities.<sup>20</sup>

Another important point regarding science derives from a further semantic invention which can be ascribed to the German university: the *postulate of the unity of teaching and research*.<sup>21</sup> The prevalence of this postulate demonstrates once more the absence of educational ideals as the close coupling of research processes and their presentation in interaction systems substitute for original educational ideas and institutions.

## VIII Systemic Properties of the University System

On the basis of the expectation structures and rules explicated up to this point arises a university system characterized by some systemic properties. Among these the competition of a plurality of universities in a decentralized system is perhaps the most prominent.<sup>22</sup> One further implication is that in such a system there are stronger and weaker institutions but there should not exist marginal institutions in which the participants live under the impression that they are not really part of the system. It was one of the strengths of the German tradition to avoid such marginalization effects, and it will be an important question regarding the structural effects of the present “excellence initiative” if Germany succeeds to continue this systemic property.

Further systemic implications regard the career structure for professorial personnel. In this respect it has to be said that the German university is a professorial university as is true for most university systems in the world. Being a professorial university means that the major structural decisions in an organization are taken as decisions over whom to hire for a certain position. Structure formation is then done by new professors entering the organization and they bringing around new specializations and competences with them. A national system such as the German system is then formed by a nationwide career structure into which all organizations in the system are included. This is strictly incompatible with a local recruitment of professors. In their careers academics circulate through the university system, and if they are successful they progress in a hierarchy of institutions. Even universities which are weaker in intellectual and financial terms are part of the system. They typically function as institutions in which young academics find their first career positions.

## IX Cities and Universities

Germany always was and still is decentralized in a political sense. There were hundreds of principalities and free cities in early modern Germany, and there still exist sixteen “Länder”, today. Under these circumstances no really big cities arose, until Berlin became such a metropolis in the 19<sup>th</sup> century. Furthermore there was a functional differentiation of cities, some of them becoming the seats of government, others primarily being military cities with

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<sup>20</sup> For the very strong position of engineering and the physical sciences in Germany see King 2004, esp. Figure 3. This rise of the technical universities in Germany seems to be related to the weakening of the German universities by the establishment of the “Kaiser Wilhelm Gesellschaft/Max Planck Gesellschaft” (foundation dates: 1911/1948). Especially the turn of the MPG from applied to fundamental sciences weakened the university landscape; cf. Hohn and Schimank 1990, Ch. 4.

<sup>21</sup> Cf. Stichweh 1994a

<sup>22</sup> See for an influential statement Ben David 1971.

significant garrisons. Under these conditions arose the *comparatively small university city as a functional type of its own* – Tübingen, Jena, Marburg, Freiburg, Heidelberg, Göttingen even today being good examples of this type. Since 1808 metropolitan universities were slowly added to the system – Berlin, Munich and only in the 20<sup>th</sup> century Cologne, Hamburg and Frankfurt. The system is still characterized by a bifurcation around these two types. And finally since the 1970s some campus universities were somehow accidentally added to the system (Bochum, Bielefeld, Konstanz). But they do not have significant scientific or educational characteristics of their own. Their genesis seems primarily to be related to political intentions to build new medium-size and regionally oriented universities in a short time span – and this in a phase of educational expansion and inclusion of new segments of the population.

## **X Professional Careers**

I already mentioned the career structure of academics finally becoming professors. But most university students, of course, did never intend to become scientists and professors. But they were related towards the core of the university tradition via the concept of “Bildung” (self-cultivation) and via protestant concepts of “Beruflichkeit” (occupation, profession).<sup>23</sup> The profession one chose was often interpreted to be a “vocation” into which one could only enter via a “call”. “Call” here means an inner self-experience of the choice of profession being a somehow necessary choice, not being something one could have done in any other way. And these concepts of “self-cultivation” and “professionality” as vocation generated the form in which one could remain tied to the university tradition for one’s whole life. This general relatedness to a knowledge ideal and its professional implications is a functional equivalent of the American concept of being an “alumnus” of a specific university which means a much more concrete tie of being an ongoing “member” of the institution to which one first came as a student.

## **XI Interrelations with Society**

The extraordinary societal position the university once occupied in German society was mirrored in the high status attributed to university professors. Especially around 1900 they had their safe place among other members of the upper elite strata of society.<sup>24</sup> At the same time this probably was the period in which the influence of university professors on political affairs and public opinion was greater than ever before or ever since. “Gelehrtenpolitik” (“the politics of scholars”) is one term for the enormous influence academics had at this time on all groups significantly involved in politics.<sup>25</sup> But this influence on public affairs did not imply transfers from academic and from university roles into other elite statuses in society. These transfers did rarely happen in Germany and they still rarely happen today. A university professor becoming the CEO of a public company or a university professor assuming the responsibility for a ministry in one of the German states are not very often to be seen, although there are exceptions, and there was an interesting episode in the German general election in 2005 with a legal-constitutional scholar running for high political office on an agenda of tax reform and the leading candidate from the other party always calling him “the professor” and thereby successfully damaging his image. This restriction of academics to their own sphere was somehow balanced by a kind of monopoly granted to them as representatives

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<sup>23</sup> A good case study of this is Olesko 1991 and on “Beruf” Conze 1972.

<sup>24</sup> An interesting half-fictional account from physics is McCormach 1982.

<sup>25</sup> See vom Bruch 1980.

of all serious types of knowledge.<sup>26</sup> This is the reason why the role of the intellectual producing influential definitions of the societal situation and being completely independent from universities and scholarship is not a prominent phenomenon in Germany – and again this was already true for the 18<sup>th</sup>-century situation and is more or less still true today.<sup>27</sup>

A last feature to be mentioned regards cosmopolitanism. The German university of the period we are looking at in this essay was always rather cosmopolitan – and cosmopolitanism primarily meant openness to foreign students and to the influences which might come from them. But this cosmopolitanism did not imply that students from foreign countries made their academic careers in the German institutions. After their Ph.D. dissertation, at the latest, they normally went back to their mother country and often were responsible for the institutionalization of university structures somehow derived from the German paradigm.<sup>28</sup> But only rarely they became professors at German universities which means that never in its history the German system realized the excellence for which it strived and which it temporarily achieved via the import of persons from a diversity of migration backgrounds. This is a clear difference to the American situation.

## **XII Conclusion: Basic Rules Generating the System**

Among the many features and institutional rules mentioned in this review there are some of which it may be said that they are of especial relevance as constitutive rules of the system. I will suggest this core of institutional rules.

First it has to be pointed once more to the strong coupling of supporting states and universities. In the history of German universities the state was not primarily seen as a repressive and restrictive force, but as an enabler of some of the most valuable structures of university life. The state did not endanger “academic freedom” – and the concept of “academic freedom” probably became the second basic rule of universities. Instead the state has sometimes been seen to be dependent on “academic freedom”, as the university in one of its most prominent self-descriptions rose to become an independent consultative voice which the state urgently needed to understand its own tasks in an enlightened sense.<sup>29</sup> The generality of knowledge dear to the university tradition and the generality of interest representation state power should strive for in most of its understandings somehow became related towards one another in the German development.

A third basic fact is the university as an institution being very inclusive in knowledge terms. All relevant societal forms of knowledge finally get institutionalized in the university and at the same time the university as an institutional encyclopaedia of knowledge demonstrates the societal centrality of knowledge. In Germany the university is the most fundamental institution of knowledge society.<sup>30</sup> Knowledge needs continuous renovation and refreshing. “Research” became the institutional term for all activities enabling this continuous renewal of

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<sup>26</sup> Cf. Stichweh 2004.

<sup>27</sup> But this has to be said with some caution. There are first of all writers who again define an intellectual sphere of their own, rarely becoming university professors in Germany, but some of whom are very influential in intellectual terms; there are today many people who become “intellectuals” via TV; and there is beside writing the autonomous world of cinema and theatre. An interesting list is the so-called Cicero Ranking of the 500 most influential German intellectuals, see <http://www.cicero.de/839.php?ausgabe=05/2007>.

<sup>28</sup> Cf. for a recent collection of case studies Löser and Strupp (eds.) 2005.

<sup>29</sup> This, of course, was the position of Immanuel Kant, Kant 1798; and cf. as an interesting explication of this Brandt 2003.

<sup>30</sup> See Stichweh 2006.



knowledge. In university terms from this derived the “unity of teaching and research” which was supposed to guarantee that this continuous renewal of knowledge becomes a habit inculcated into university students by a kind of university teaching being closely coupled to the progress of knowledge.

And finally there is a fifth characteristic: It was not “state planning” and not “division of labour” which became the most successful metaphors for a productive design of the structure of a university system. Instead *competition in a decentralized system* happened to become the most prominent structural characteristic of the system. Every reform in our days should not substitute a hierarchical structure for this, but should concentrate on reenergizing this feature of competition in a clearly decentralized system.

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