Knowledge-based professions in transnational perspective: Cultures of gender, learning and work
Dear colleagues, dear guests,

The rise of the term “knowledge society” as one of the most influential ways of interpreting our times has changed public and scientific views on work and professionalism. Concepts like “knowledge work” or “knowledge-based professions” are not only met with a positive response in the world of professional work and occupation, but are also the subject of growing interest from researchers. Those concepts are designed to describe transformations of labour and employment and to highlight major changes in the interplay between knowledge and work. However, those and similar concepts are controversially discussed: Do they capture societal realities or do they rather promote a certain political and economic agenda? What is implied, if we assume that knowledge has become the most important mode of professionalization? To what extent do knowledge-intensive professions change, e.g. their work profile, their normative orientation and their social status? Which shared features and differences between knowledge-based professions can we identify?

These questions provide starting points for the international and multidisciplinary conference to be held from Thursday, June 18, to Saturday, June 20, 2015 at the Department of Education at Technische Universität Berlin. The conference will focus on three different cultures or symbolic orders created through social practices: cultures of gender, cultures of learning and cultures of working. We aim to further examine transition and persistence of these cultures facing the current changes of work and profession and the increasing significance of knowledge. The conference is intended to bring together scholars interested in recent developments in several knowledge-based professions and to present findings from new research.

We would like to thank all contributors and moderators for their willingness to participate in the conference. We are much looking forward to welcoming you at the Technische Universität Berlin.

Helga Marburger, Christiane Griese und Thomas Müller
International and interdisciplinary Conference

Knowledge-based professions in transnational perspective:
cultures of gender, learning and work

Organizing Team

Helga Marburger
Christiane Griese
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Julia Scholz
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Support

The conference is funded by

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15.00  Registration  
(Room H 3005, Main building of the Technische Universität Berlin)

16.15  Welcome  
Prof. Dr. Angela Ittel  
Vice President for International Relations and Teacher Education,  
Technische Universität Berlin  
Prof. Dr. Helga Marburger  
Director of the Institute of Education, Technische Universität Berlin

16.30  Keynote  
Prof. Tara Fenwick  
University of Stirling, UK  
Imitation Games: Knowledge, Professions, and Complex Futures

17.45  Informal Get Together

Friday, June 19, 2015

08.00  Registration  
(Room MAR 0.011, Institute of Education, Marchstraße 23)

09.00  Keynote (MAR 0.011)  
Prof. Dr. Susanne Ihsen  
Cultures of gender, learning and working in Engineering – Ambivalences between “business case” and change resistance

10.00  Coffee break (MAR 0.002)

10.15  Session I: Learning cultures – social and technical innovations  
(MAR 2.057)

10.15  Session II: Knowledge management in engineering professions  
(MAR 0.002)

12.15  Lunch

13.15  Session III: Professionalization of pre-school and early childhood education  
(MAR 0.011)

13.15  Session IV: Concepts and contexts of knowledge work  
(MAR 2.057)
14.45 Coffee break (MAR 0.011)

15.00 Keynote (MAR 0.011)
Prof. David James
Cardiff University, UK
Towards a dynamic view of professional practice, knowledge and identity

16.00 Coffee break (MAR 0.009)

16.15 Session V: Transformations in higher education (MAR 0.009)
Session VI: Changes in the teaching profession (MAR 2.057)

Saturday, June 20, 2015

09.00 Keynote (MAR 0.011)
Prof. Dr. Ulrich Bauer
Technische Universität Graz, Österreich
The Profession of Industrial Engineers and Managers (IEM) in a Cultural Context

10.00 Coffee break (MAR 2.057)

10.15 Session VII: Knowledge-based professions between flexibility and hybridisation (MAR 2.057)
Session VIII: Knowledge work and transnationalization (MAR 2.068)

12.00 Lunch

13.00 Forum: Knowledge and knowledge transfer in healthcare professions (MAR 2.068)

14.15 Conclusion and farewell (MAR 2.068)
Conference Programme

Thursday, June 18, 2015

15.00  Room H 3005: Registration

16.15  H 3005: Welcome
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       Imitation Games: Knowledge, Professions, and Complex Futures

17.45  H 3005: Informal Get Together

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08.00  MAR 0.011: Registration

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       Prof. Dr. Susanne Ihsen
       Technische Universität München
       Cultures of gender, learning and working in Engineering – Ambivalences
       between “business case” and change resistance

10.00  MAR 0.002: Coffee break

10.15  MAR 2.057: Session I: Learning cultures – social and technical
       innovations
       (Chair: Dr. Jan Pfetsch,
       Technische Universität Berlin)
       Dr. Tanja Mansfeld
       Projektträger Jülich
       Knowledge-Intensive Professions – New Approaches to Teaching and
       Learning

       MAR 0.002: Session II: Knowledge management in engineering
       professions
       (Chair: Thomas Müller,
       Technische Universität Berlin)
       Prof. Dr. Hans-Luidger Dienel
       Technische Universität Berlin
       Personal knowledge management of engineers, 1850-2015.*
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Technische Universität Dortmund  
Social Innovation: The Emergence of a New Learning Culture!?  

Bianca Prietl  
RWTH Aachen  
Engineering as Management. Gender Cultures of an Advancing Professional Image  

12.15  
Lunch  

13.15  
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Professionalization of pre-school and early childhood education  
(Chair: Dr. Jörg Nicht, Freie Universität Berlin)  

Prof. Dr. Susann Fegter  
Technische Universität Berlin  
More Men in Early Childhood Education!?“ - A Comment from the Theoretical Perspective of Profession and Gender  

Georg Reischauer  
Technische Universität Wien  
How do knowledge workers integrate knowledge in the organization? A practice-based perspective  

Annika Schweizer  
Freie Universität Berlin  
Professional Knowledge and Knowledge-Based Acting in Early Education. Teacher-parent Interaction in Preschool Education  

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Knowledge-based professions and knowledge work – Reflections on two contested concepts  

14.45  
MAR 0.011: Coffee break  

15.00  
MAR 0.011: Keynote  
Prof. David James  
Cardiff University, UK  
Towards a dynamic view of professional practice, knowledge and identity  

16.00  
MAR 0.009: Coffee break
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Universität Szczecin  
Coaching as a knowledge profession and the support of young mothers: The pilot project ‘GPS for the family’

Luana Ladu  
Technische Universität Berlin  
Vocational skill development in international development cooperation

Prof. Dr. Helga Marburger  
Technische Universität Berlin  
Hybrid Knowledge Professions – Comparing qualification profiles of industrial engineers and education managers

12.00 Lunch

13.00 MAR 2.068: Forum: Knowledge and knowledge transfer in healthcare professions  
(Chair: Prof. Dr. Christiane Griese, Technische Universität Berlin)

Prof. Dr. Uwe H. Bittlingmayer  
Pädagogische Hochschule Freiburg  
Public Health Professions between Knowledge Work, Professionalisation and the Pressures of Labour Markets

Prof. Dr. Karin Rothe  
Charité – Universitätsmedizin Berlin  
Accident prevention in paediatric surgery – medical and ‘advice’ knowledge in the health professions

14.15 Conclusion and farewell
Professional knowledge and practice in all fields is being transformed by two interlocking forces: the ‘big data’ deluge, and the software algorithms that are collecting, comparing, and calculating data to make diagnoses, predictions and even decisions. Some critics have been raising alarm about this virtual imitation of professional service. Others call attention to the wide reaching and accelerating consequences of big data and software code, claiming that we – professionals, researchers, policy makers and the public – are just beginning to realise the enormous challenges they are producing. This presentation aims to set out the key issues particularly relevant to professional practice posed by big data and software code. It begins by outlining definitions, forms and examples of these digital dynamics in fields such as health care, education, law and human resource management. It poses critical questions for researchers and educators about new forms of professional knowledge being generated in and with new data analytics, and asks what these mean for changing professional responsibility in complex futures. It concludes by suggesting implications of these issues for professional learning and education.
The engineering profession in Germany developed traditionally as a closed system, as mysterious, weary, and a male dominated monoculture. But since the beginning of the 21st century two argumentations show change dynamics inside and outside Engineering:

- The demographic change, the more interdisciplinary context of technical research and the more public role of technology in society opens the engineering culture for questions of economics and politics.
- The diversity approach assumes a change of engineering research and development itself by mixed teams and opens the engineering culture for questions of new technological design.

Nevertheless, we have change and more female students and engineers at the one hand, but cultural resistance against their professional integration on the other. The presentation discusses a difference-oriented perception in engineering to embed gender and diversity sensitivity into the traditional culture. The presentation describes this ambivalence between future orientation and tradition as a manageable conflict.
Towards a dynamic view of professional practice, knowledge and identity

David James
Cardiff University, Cardiff, United Kingdom

Both long-established and more recent sociological formulations offer ways in which to appreciate the economic, social and occupational location of professions and professional work. There is also important work giving insights about the nature of professional knowledge and how it operates. What is often more difficult to see is the relationship between such understandings and the day-to-day practices and lived identities of professionals.

In this presentation, I want to suggest that professional practice and identity are most helpfully understood relationally, as the intersection of biography and current circumstances. To do this, I will introduce the concept of a learning culture. Drawing upon Bourdieu, Dewey and on aspects of situated learning theory, this was originally developed in a research project that I co-directed on teaching and learning in the Further Education sector in England. I will try to illustrate the concept’s utility for achieving a dynamic view of professional practice, knowledge and identity and its potential to be adapted and applied in new settings.
The profession of IEM’s is based on an interdisciplinary education, covers a wide field of activity, and has been very successful in recent decades. The article describes the distinguishing characteristics of the profession and explores the professional culture associated with it. The importance of culture in everyday professional practice is explained. The employability of IEM’s has been high up to the present and this shows that the skills of qualified IEM’s match the needs of the market. The article describes the skill set that IEM’s ought to have, in the opinion of graduates of an IEM degree course on the one hand and employers on the other, in order to achieve this high employability. Finally, some current trends in the profession are outlined, as well as their implications for the relevant third-level curricula.
As a result of the high relevance of science and technology, scientific knowledge plays a crucial role for today's society. With the establishment of the Digital Factory as the seminal production concept and the further promotion of high-tech strategies (Industry 4.0) by the German federal government the relationship between knowledge and profession is changing substantially. In order to apply the new knowledge, educational processes are required to transfer it.

The future quality of social development will be determined by the creation of the access to knowledge. Since knowledge can only be acquired through individual strategies and therefore cannot be instructionally determined, it is the result of an individual process of construction. In the field of vocational education learning cultures are in the midst of change. Digital teaching and learning media move more and more into the center of technical didactics and methodological reflection. Simulations can make a valuable contribution to the understanding of production-related workflows and technical relations. They can anticipate technical and organizational decisions, control respectively structure processes and simplify controls. Thus, the simulation proves itself an appropriate teaching tool for specific technical educational and engineering science courses of studies on the one hand, and as a basic learning tool for a cognitive preparation for in-plant workflows of selected professions on the other hand. This contribution examines the use of multimedia applications and simulations on the basis of complex teaching and learning arrangements with computer simulations from the perspective of cognitive psychology, teaching and media-related theory. Furthermore the technical point of view and the use of multimedia applications and simulations with regard to teacher training are considered.
Social Innovation: The Emergence of a New Learning Culture!?

Antonius Schröder
Technische Universität Dortmund

Every technological or economic innovation is also a social innovation and learning process indicating the effectiveness and efficiency of the solutions. The potential of innovations could only be unfolded if they are embedded in social practices, including the development of new competences and capabilities. A holistic perspective is required mutually reinforcing technological and social innovations and solving the big challenges of society (e.g. described in the declaration “Social Innovation for Germany”).

This includes also the common development of new learning cultures in the sense of lifelong learning. The concept of “Social Innovation” is delivering a new reference framework of a process related development and implementation of new learning structures and contents involving all the relevant actors and stakeholders (e.g. management and employees, research and development as well as personnel development departments, learners and educational institutions).

The management of change has to be empowered by unlocking the potential of Social Innovations through a more active participation of learners: within and beyond the formal education and training systems (top-down and bottom-up, blurring the boarders of separated educational areas, from an institutional to a learner’s perspective). Solutions have to be developed for and with the learners, including new pedagogic approaches.

Exemplarily social innovative learning approaches are on the one hand new company internal innovation and cooperation activities (like the knowledge management of the ThyssenKruppSteel AG) as well as the international and cross-company cooperation of European, sectoral and regional actors (e.g. in the European funded projects GT VET/GREEN STAR, euroING, EUWIN). Besides, the emergence of new regional-local structures for lifelong learning (e.g. HESSENCAMPUS) belongs to the new concept of Social Innovation as well.
Changes within education are influenced by new demands and needs of the companies and the learners. Learning is more and more transferred to the working place and digital media are playing an increasing role in education and qualification. Besides traditional learning arrangements like “seminar” or “training course” new learning architectures are increasingly arising - much more committed to learning outcomes. New learning designs and processes are possible within education and training arrangements.

Since a lot of years *gaus GmbH* is developing such new learning architectures going beyond traditional learning arrangements – within orders of the private economy or within pilot research projects. Central elements for designing learning within the working process are: (1) benefit and motivation, (2) intensified and concentrated input, (3) action and transfer, and (4) usage of digital media. The related demands on learning and learning culture as well as demands on new process chains and logistics are shown by an example of practice.
Session II: Knowledge management in engineering professions

Personal knowledge management of engineers, 1850-2015.*

Prof. Dr. Hans-Luidger Dienel
Technische Universität Berlin

Personal knowledge management as a cultural technology to cope with daily information and information overload is often overlooked in the growing field of knowledge management. The paper presents a historical analysis of around 1000 personal engineering notebooks since 1850 in Germany and gives new insights how personal notes and notebooks have structured personal knowledge management of engineers.

In a first part, the paper characterises personal notebooks, their size, material, paper, number, place for storage, the types of notes and drawings, typical ways to use and make use of notebooks in a diachronical perspective. In a second part, the paper presents the recognition, notebooks as a source for qualitative research of knowledge management have received so far, and it offers some hypothesis why and how an analysis of notebooks can offer new research perspectives on personal knowledge management. Three case studies offer new interpretations of classical ideas on knowledge management of engineers.

In a concluding third part, the paper describes how and where engineers and scientists learned how to take notes. It presents printed notebooks as a reaction on personal notes and discusses the decrease of the cultural technology of taking and storing personal notes in recent years.
Commonly the engineering activity is perceived of as a knowledge-based profession in the technical arena, although it has always been occupying a specific double location in between hands-on and theoretical work and, thus, provides an ideal case for studying cultural boundaries and the practices of their construction. This is also interesting from a gender perspective as the professional boundaries in engineering have been shown to be intertwined with gender boundaries. In the context of the advancing image of the engineer as manager, it is the boundary between ‘the technical’ and ‘the social’ that has become of considerable importance.

From a discourse theoretical perspective and on the basis of qualitative interviews, this paper investigates the symbolic connections between professional and gender culture in German engineering. Thereby the image of the engineer as manager is re-constructed as the result of context depending variable and in parts contradictory discursive practices of distinction that are far more complex than a ‘simple’ mapping of the binary gender dualism onto the technical/social dualism would suggest. Gendered ideas about the ‘tinkerer’, leadership skills and professional commitment constitute the engineer as a male coded subject and symbolically marginalize women albeit claims for more gender equality in this professional field.
The professionalisation of French engineers through learning humanities

Dr. Christophe Morace
ENSTA Bretagne

Today it is common knowledge that technology studies are not sufficient for engineers who have to meet the challenges of the knowledge society. In France, humanities especially in the elitist Engineering Schools and more and more at university, are mandatory courses to obtain the diploma of Master in Engineering.

In this paper, the notion of “humanities” is an attempt to translate the expression “formation humaine” (human training) that may include communication techniques, self-development, organisation sociology, politics, ethics and the Arts.

In our contribution, we question how studying and learning humanities at French schools of engineering has led to a culture-specific professionalisation of engineers in France.

As early as the 17th and 18th century, engineering schools rather than universities were founded, for economic and political reasons. The engineers who were trained in these engineering schools were close to the state and power. They belonged more and more to the elite and could have an access to state engineers, high civil servants at court and the king himself. Therefore, it became a tradition that engineers not only learned technology but rhetoric, fencing and fine arts. In the 20th century, an Engineering Accreditation board (Commission des Titres de l’Ingénieur – CTI) was founded. Since 1934 this Board has verified the contents of curricula, including the teaching of humanities, which represents 30% of the entire curriculum of engineering studies.

In the meantime, companies and state have more and more expectations towards engineers. The expectations in economics and technology on the one hand, and in management and humanities on the other hand, are making professionalisation more and more difficult.

In this symposium, we will consider the question: How does the teaching of humanities at French engineering schools influence the knowledge, the competences and the professionalisation of an engineer who should be a “specialist” as well as a “generalist, and how does this compare with other countries.
Session III: Professionalization of pre-school and early childhood education

„More Men in Early Childhood Education!?“ - A Comment from the Theoretical Perspective of Profession and Gender

Prof. Dr. Susann Fegter
Technische Universität Berlin

The perspective on the under-representation of men in Early Childhood Education has been changing in international discourse since the 1990th. About ten years ago a discussion about “more men” or “a lack of men” has started also in Germany. An expression of this development are publications like “Brauchen wir eine Männerquote in Schulen und Kitas?” (Hurrelmann/Schulz 2012) or the program “MEHR Männer in Kitas”, run by a Federal Ministry. Arguments in the public discourse are oriented to a better MINT-education, a better support for boys, or more gender justice in the field of work. In my paper I will analyze this discussion as a discourse, using the archaeological approach of Foucault, and discuss it in the context of current politics of education and professionalization, with a specific interest in the relevance of gender orders.
The concept of the *knowledge society* stresses that education is not only the most important economic resource for a national state in global competition, but also crucial for an individual's healthy development, social integration and democratic participation. Therefore, in Germany the attention for early education has increased significantly. The debates show that in early education several actors play an important role: the child itself, (educational) policy-makers, day care centres and parents. At the same time, there are controversial discussions about the rights and responsibilities of those different actors and about the appropriate concept of early education.

The German Government has strengthened the educational mandate of day care centres. The institutional changes appear to go along with a transformation of the preschool teachers’ profession. Thus, a broad debate on professionalization of preschool teachers has emerged, demonstrating the various and high demands concerning their professional work. On the one hand, for example, teachers should help to compensate educational disadvantages stemming from the parental home. On the other hand, they should regard parents as *experts for their child* and have them participate in their educational work.

Preschool teachers’ self-image and concept of early education in cooperation with parents has rarely been subject of empirical research so far. Similarly, only very little is known about if (and how) teachers and parents deal with possibly differing orientations towards early education in their everyday practice. For these reasons, the present contribution describes the challenges researchers face reconstructing these mainly implicit orientations. Furthermore, it reflects upon how these challenges can be met with the approach of the Documentary Method. The results are expected to provide insights into the meaning of preschool teachers’ professional knowledge in the teacher-parent interaction. They will also allow for examining the generation and legitimization of professional knowledge. Besides, they could also show what role parents’ intimate knowledge about their child and their family plays in the institutional context. Additionally, it could be investigated, whether the significance of preschool teachers’ professional knowledge has changed and how professional knowledge-based acting in early education is possible considering the different expert groups of the field.
A major interbranch similarity of knowledge workers is that they interact with organizations. Especially the result of knowledge work, new knowledge, is integrated in organizations on a regular basis. While so far especially the role of information systems for integrating knowledge has been studied, social practices are becoming increasingly important. To arrive at a basic understanding of the integration of knowledge in organizations from a practice-based perspective, this conceptual article proposes a typology of knowledge integration practices. It rests upon two dimensions that are considered as core antecedents of knowledge integration: the complexity of the problem (high vs. low) that should be solved with the to-be-integrated knowledge on the one hand; the social space (close vs. distant) from which the to-be-integrated knowledge comes from on the other hand. Combining these two dimensions results in four archetypes of knowledge integration practices: “filing”, “designing”, “reframing”, and “translating”. The article details these types with the categories “perspective-taking style”, “interaction style”, and “language style”. This basic elaboration of the complex linkage between knowledge and action in the context of knowledge integration aims to contribute to a better understanding of the learning culture of knowledge professions.
Knowledge-based professions and knowledge work – Reflections on two contested concepts

Thomas Müller
Technische Universität Berlin

The fact that we live in a knowledge-based society, that knowledge represents an economic resource and that work is increasingly knowledge-based work has become commonplace. Having become part of our every-day knowledge, these observations are now considered a given in public debates. In Social Sciences there are not many who doubt that societal structures have undergone a lasting change and that knowledge plays a core part in these developments. Yet the assertion of a knowledge-based society continues to be controversial in scholarly discourse. The new determination of the relationship between knowledge, work and profession (which has been frequently noted) requires a conceptual clarification.

My paper focuses on two prominent terms which, having been used in the social-scientific analysis of the contemporary for some time already, have this way also entered the research on professions and occupations: ‘knowledge work’ and ‘knowledge-based professions’. Both terms are not only used relatively widely in relevant debates but have a certain appeal as they sound innovative and seem to explain semantically the structural changes affecting the work-related aspects of society. This alone should be a reason for looking at the two concepts more closely. It quickly becomes apparent that both terms are very generic and that they therefore require clarification or a more precise definition.

The first part of this talk will examine the two terms using the writings of Nico Stehr and Helmut Willke and will then locate them within the scholarly debates about the concept of a ‘knowledge society’. In the second part the paper will ask about the relationship between the knowledge-based professions and professions more widely. The third and last part addresses three aspects which transcend a purely conceptual analysis and open up options to connect with empirical research.
Session V: Transformations in higher education

Shifts of learning cultures and professional knowledge in STEM –
The integration of gender and diversity studies into higher education

Prof. Dr. Petra Lucht
Technische Universität Berlin

In this paper, I present a teaching concept for integrating intersectional Gender Studies into inquiry-based study projects in higher education in science, technology, engineering and mathematics (STEM). This teaching concept has been developed in my research seminars of the study programme GENDER PRO MINT* of the Center for Interdisciplinary Women's and Gender Studies (ZIFG) the Technische Universität Berlin (TU Berlin). In response to societal and political demands, the TU Berlin has established this innovative study programme in 2012: In this study programme students in higher education in STEM learn how to integrate gender and diversity aspects into research and development of their fields of study. The study programme GENDER PRO MINT signals that learning cultures and professional cultures as well as of professional knowledge in STEM shift towards an inclusion of gender and diversity studies.

In my talk, I will present the threefold approach of my teaching concept to advise inquiry-based study projects in gender and diversity studies: Firstly, I relate the thesis "Artefacts are doing intersectional gender politics." to discourses of Gender Studies in STEM. Secondly, I rely on an inquiry-based approach of learning and teaching in the research seminars of the study programme GENDER PRO MINT. This approach enhances the students' competence to integrate perspectives of intersectional Gender Studies into their inquiry-based study projects in STEM. Thirdly, I will give examples of computer science, landscape architecture, mechanical engineering, physics and medical engineering to show how students of STEM have realized the integration of gender and diversity aspects into their inquiry-based study projects or qualifying theses.
From a culture of reproof towards a culture of learning –
Reflections on a prospective professional profile of a cultural mediator with
reference to processes of intercultural education in school and high school in
research and (best) practice

Prof. Dr. Stephan Wolting
Universität Poznań

Recently the focus is shifted to the scientific and social dilemma concerning the sub-
ject of intercultural communication: on the one hand it is called – referring to an
term of Foucault – a “dispositive” or a cultural topic. On the other hand it is consid-
ered that there is a lack of measurable results and that is something most desirable in
the fields of research and teaching.
This mentioned and marked dilemma is especially to observe in the education and
formation of professional cultural mediators and in the quality management of pro-
fessional degrees and qualification in the field of intercultural trainings. This paper
tends to give up the “universal” measurable values of this fields, but to put the em-
phasis more on concrete and empirical studies in school and high school and to plead
for that the academic culture gets closer to the subject of our scientific observation.
We would like to take our starting point with the question why teachers and high-
school teachers need intercultural competence and awareness of diversity and in
which way the education to a cultural mediator should response to that point of
view, so that we will have in the end “a culture of learning instead of a culture of re-
proof” (Wolf Lepenies).
**Session VI: Changes in the teaching profession**

*From knowledge transfer to acquisition of competencies – the paradigm shift in teacher-training*

Dr. Claudia Gómez Tutor  
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Within traditional university teaching it is assumed that learning can be controlled. In contrast to this, the concept of competence-oriented teaching focuses on the individual and its possibilities to actively acquire knowledge. Due to its focus the concept of competence-oriented teaching is linked to a new perspective on the planning and the design of teaching activities. Within this perspective it is assumed that learning can be stimulated and facilitated but not produced.

Using examples of interdisciplinary and multi-phase teacher training courses different ways in which skills development of university students might be initiated will be illustrated. Moreover, it will be presented in which ways skills development can be promoted and anchored sustainably to bring out self-reflecting teachers. The role of teacher educators within this context will also be discussed.
Professions are considered to be the result of a functionally differentiated society, a society in which experts have emerged for specific fields of activity and for specific tasks within the different domains of society. The teaching profession has achieved its own status as a profession through intensive debates on the one hand, yet it is at the same time also constantly being threatened by tendencies of de-professionalization. This paper aims to identify lines of development of professionalization and de-professionalization and the reasons for them. In the course of this it will explore the tensions between both tendencies through the prism of a history of education and in the context of current developments at schools. This is intended to highlight a specific trait of the teaching profession: It is characterized by a readily available and at the same time fragile professionalism. This means that the teacher’s professional standards are to a high degree depending on demography and the economic environment. This not only reflects a fragile understanding of the profession from the outside, but also leads from within to a weakening of his/her own professional identity.
Session VII: Knowledge-based professions between flexibility and hybridisation

Self-perceptions of professional adult educators
in the field of business education and development

Verena Liszt
Universität Paderborn

It has been realized by the professionalization research community that the relation between knowledge and profession has changed. In the field of business education and development, which is seen as a polyvalent discipline, adult education is one field of work for the graduates. These graduates going into the field of adult education experience their daily work routine facing and dealing with supporting and hindering conditions. These individuals develop their own individual professionalization and feel the pressure of the systemic professionalization, which is not necessarily the same. Consequently, the questions discussed in this presentation will be about the self-perceptions of these individuals in this professionalization dilemma. Furthermore, the discussion will be about the conditions in adult education with regard to the question how individuals can deal with these. Therefore, the results of narrative interviews and pictures of the interviewees’ working desks were analysed and first results will be presented.
Coaching as a knowledge profession and the support of young mothers:  
The pilot project ‘GPS for the family’

Dr. Aleksandra Sander  
Szczecin University

A pilot project offering pre-vocational preparation to young mothers has been initiated at local level at the District Family Welfare Centre (Powiatowe Centrum Pomocy Rodzinie - PCPR) in the region of Police in West Pomerania. Coaching as a means of transferring knowledge and skills plays a central role within the scheme. The paper explores aspects of the professional self-understanding of the coaches in relation to their concrete pool of clients. The specific interest in this project results from the encounter of knowledge professionals on the one hand with a socially and professionally marginalized, threatened and exclusively female clientele on the other. The paper addresses the following issues in particular:

1. Theoretical foundations of coaching as a form of advising clients;
2. Coaching to individually help the clients strike a balance between work and family life and the specific method used for this;
3. The role of coaching in the model project ‘GPS for the family’.

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Hybrid Knowledge Professions – Comparing qualification profiles of industrial engineers and education managers

Prof. Dr. Helga Marburger
Technische Universität Berlin

In the German-speaking countries the conceptualisation, creation and establishment of Industrial Engineering as an academic degree programme can be viewed as the genesis of the prototype of what we now call ‘hybrid knowledge professions’. Founded in the winter semester of 1926/7 at the Technical University Charlottenburg (now the Technical University Berlin) and initially called ‘Economics and Technology’ before later being renamed ‘Industrial Engineering’, the development of this degree programme documents the development of a qualification profile which combines two knowledge domains (technology on the one hand, economics on the other). Both domains have – at least this is how it was phrased at the time – two very different logics of knowledge and almost opposing professional applications. Questions about their fundamental capacity for mutual integration or about their fundamental modalities were as much in the centre of considerations when the degree was introduced as the foreseen step by step expansion of industrial engineering to other technical universities, general universities and universities of applied sciences. The actors at the time argued that the reasons for this needed new combination were to be found in the demands and requirements of a specific field of activity.

Comparable discussions have more recently been accompanying the introduction of Education Management, Social Management, or Health Management. As before, two knowledge domains are being combined with each other for which the assertion is that there is a traditional prevalence of very different logics of knowledge and - with a view to their practical applications – of very different main ideas. By way of example this comparison of qualification profiles between industrial engineers and education managers, based on the reading of study regulations and examination regulations, is designed to help understand the emergence of hybrid knowledge professions and their specific characteristics.
Session VIII: Knowledge work and transnationalization

EU-Professionals as transnational knowledge workers?
The transnational social field of EU Affairs

Lucia Leopold, Dr. Sebastian Büttner and Prof. Dr. Steffen Mau
Humboldt-Universität zu Berlin

In this article we scrutinize the emergence and expansion of EU-related professions and forms of occupation from a field-analytical perspective. Starting from the observation that the EU is not just an influential political actor, but also an expanding area of work, expert involvement and job specialization, we discuss various forms, dimensions and loci of the ongoing “professionalization” of EU expertise. Moreover, we show that the expansion of EU related professional activities is not just a phenomenon of Brussels and the “Eurocracy”, but has expanded into the member states and various occupational areas - traditional ones as well as “new” ones. We understand EU-professionalism as a transnational field of specialization and professionalization which produces own principles, forms of knowledge and resources which are used and reproduced by experts and specialists. The field perspective allows us to identify common principles, but also the variance and transnational dimension of EU-affairs. On the basis of interview data collected in our field study „EUProfessionalism. Professionalization of EU-expertise“, we compare several occupational areas regarding the extent of transnationalization, required knowledge and the social status within the field. Finally we discuss to what extend EU-Professionals can be understood as transnational knowledge workers and what characteristics seem to be typical for knowledge work in transnational fields.
Vocational skill development in international development cooperation

Luana Ladu
Technische Universität Berlin

Dynamic systems of education and vocational training and innovative formats for life-long learning are essential for the development of today’s knowledge society and economy, particularly in the framework of international development cooperation. This presentation will illustrate best practices on the transfer of globalized vocational skills development (VSD) models, such as the dual system and national qualification frameworks, to developing countries. It will show lessons learned from the implementation of numerous international development cooperation projects in the fields of education, capacity building, vocational training and education reform. Special focus will be given to the presentation of the activities and results of the project “AADLC- Knowledge Transfer in Change Management”, a project financed by the WB with the objective of promoting the process of transitioning from a donor-supported to a self-sustaining network structure. The change management process involved the following main areas: Business Development, Governance, Learning and Design, ICT development.
There is a broad consensus among friends and enemies of the capitalistic economy, as well as among disciplines such as sociology, economy, political sciences and Public Health that the knowledge economy is basically crucial for the prosperity of national economy. Reflecting the fact, that there is still no convincing theory of knowledge economy, clarify the complex relationship between knowledge workers and economy, my contribution is based on the sociology of knowledge and sheds light to the topic of health.

Health is without doubt one important realm of the knowledge economy. It is one of the most dynamic and most innovative labour market sectors. However, the realm of health does not mean something consistent, since there are (at least) two very different groups involved: First there are the medical and pharmacological professions which contribute to the knowledge economy mostly through pharmacological innovations, new patents for medicines (e.g. Beyer) and medicine-technological innovations (in Germany mostly represented by Siemens). Second there are the permanently increasing numbers of health professions and their behavior-oriented knowledge base, representing mostly vocational practice like individual or organizational counseling. In my contribution I would like to analyze health related professions regarding they are part of the larger knowledge economy.

Therefore, in a first step I want to outline the continuing professionalisation of the non-medical Public Health professions by an analysis of the curricula of the relevant student programmes. In a second step I want to emphasis my main thesis: I will argue that the specific forms of knowledge of Public Health professions are centered around the topic of subjective self-regulation. In the third step I want to go further and will argue that this specific emphasis on subjective self-regulation is one expression of the increasing diffusion of current industrial societies with knowledge from social sciences (Versozialwissenschaftlichung) and that the idea of a comprehensive knowledge society is far more dependent on social than on natural sciences. In the last step I want to discuss some consequences of this thesis in the context of increasing social inequalities in current societies and the role of social sciences.
Accident prevention in paediatric surgery – medical and ‘advice’ knowledge in the health professions

Prof. Dr. Karin Rothe
Charité – Universitätsmedizin Berlin

Medicine counts among the classical professions – professions which are characterized by specific attributes in professional practice, such as highly specialised expert knowledge and an exclusive monopoly for enabling competencies to perform actions. There is a growing need in society to make this knowledge or parts of this knowledge accessible to a wider range of the population particularly in the interest of the prevention of accidents. In doing so, expert knowledge needs to be made accessible in such a way that it can be integrated in the wider knowledge repertoire and become effective for action. This necessarily means to transform medical knowledge into ‘advice knowledge’. Using the example of accident prevention in paediatric surgery, this paper identifies principles of transformation, designates formats of advice and discusses the actors in charge.
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Venue

The conference will take place at the Technische Universität (Technical University, TU) Berlin. To find your way on the campus of the TU Berlin you might refer to the map Campusplan.

On Friday and Saturday, the conference will be located at the building in Marchstraße 23, 10587 Berlin (see on the Map: MAR) of the TU Berlin.

How to get there

Bus and underground stations in the near of the central campus

Underground: Station *Ernst-Reuter-Platz*, Line 2 (red Line)
Bus: Stations *Marchbrücke* and *Ernst-Reuter-Platz*, Lines M45, 245 and X9
S-Bahn: Station *Zoologischer Garten*: Lines S5, S7, S75
        Station *Tiergarten*: Lines S5, S7, S75
How to get there: Marchstrasse 23

*Ground floor*

*2nd Floor*
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Notes