

## **Positive Futures for higher education? Understanding doctoral student dropout in Germany**

Doctoral students can be considered as the most effective in academic terms. However, in Germany, a high number of them fail to complete their Ph.D. degree. An estimated and constantly high rate of attrition between 30 and close to 70 percent is found in many disciplines.

### ***Doctoral education in Germany***

Doctoral education in Germany forms the first phase of any young researchers career and is therefore a major priority for universities. The universities do not only educate candidates for their own future staff needs, however, but also for non-university research institutions, departments for research and development in the industrial sector, and other highly qualified positions on the labour market. As a rule, a highly qualified first degree with good grades is a prerequisite. Once a candidate has been accepted by a professor and has a topic agreed upon for the thesis, research or experimental work can start. This lasts for two to three years at least. The candidates do not normally have to fulfil special course requirements, as they earned a research degree already. Their doctoral work is considered to be guided and supervised, but generally independent research work. Very often candidates work on a subject within the field of expertise of their supervisor. They may also take part in special small group seminars where the relevant work is being discussed between the doctoral candidates and the supervisor. Doctoral candidates do their work either on the basis of a part-time and temporary teaching and research assistantship, on the basis of a scholarship, or they have some other kind of part-time work. The need to earn money leads to a lengthening of the time in which a dissertation is finished.

The logic of the doctoral system is now changing from the personal master-apprentice relation to more collective institutional relations. One of the most important purposes of the ongoing restructuring process is the reduction of attrition rates, as attrition means loss of financial aid and invested faculty time, on the universities' end foregone earnings and late entry into labour market on the candidates' hand, as well as waste of talent. Despite these problems stemming from attrition there is a lack of research on Ph.D. attrition in doctoral programs in Germany. On the contrary, till now research has been focused solely on successful Ph.D. students.

### ***Understanding doctoral student dropout in Germany – Research Design***

This presentation aims at a better understanding of doctoral student dropout in Germany. The conceptual framework is based on the theoretical "Model of Institutional Departure" of Tinto (1993) and the findings of Lovitts (2001) and Golde (2000). Tinto (1993) identifies academic difficulties, the inability of individuals to resolve their educational and occupational goals, and their failure to become incorporated in the intellectual and social life of the institution as the three major sources of student dropout.

The research design is based on the interaction-centred grounded theory methodology (Strauss/Corbin 1996). By taking a qualitative approach based on topical in-depth interviewing data the presenter analyzed what causes doctoral attrition in Germany in a biographical perspective while trying to capture individuals' thoughts, feelings and interpretations of the doctoral dropout process. The biographical perspective helps linking institutional factors of doctoral education with the individual characteristics of the student. Based on 20 case studies of students who did not complete their Ph.D. degree and federal statistical data from the presenters ongoing research work the presentation will show a typology of non-completers in German doctoral education.

### ***Main research questions***

- What is the structure of doctoral education, for example application process, financial support, advisor relationship and the organisation of the proposed research project from the doctoral students own individual perspective?
- What are the main reasons for doctoral student dropout in Germany?
- Are there and if yes, what are the collective patterns of doctoral student dropout in Germany?

### ***Preliminary findings***

The doctoral dropout in Germany can be described as a complex interaction process between the student, the educational institution and the social environment. The interaction between the student and the educational institution varies cross-nationally due to the institutional differences. It is not possible to define a special moment of dropping out, because doctoral dropout is an individual process which lasts from 6 months to a few years. This process is influenced by various factors, one leads to another. One can discover an accumulation of risk factors reinforcing the process, which leads necessarily to a dropout. Risk factors for example are lacking of financial support and career opportunities, starting a family or problems within the supervisor-student-relationship.

### ***References***

- Burkhardt, A., Wagnis Wissenschaft. Akademische Karrierewege und das Fördersystem in Deutschland (2008). Akademische Verlagsanstalt.
- Golde, C.M. (2000): Should I Stay or Should I Go? Student Descriptors of the Doctoral Student Attrition Process. In: The Review of Higher Education. Vol. 23/2: 199-227.
- Lovitts, B./Nelson, C. (2000): The Hidden Crisis in Graduate Education: Attrition from Ph.D. Programs - Why do half of America's graduate students leave without completing their degrees? In: Academe 6/2000: 44-51.
- Strauss, A./Corbin, J. (1996): Grounded Theory: Grundlagen Qualitativer Sozialforschung. Weinheim: Psychologische Verlags Union.
- Tinto, V. (1993): Leaving College. Rethinking the causes and cures of student attrition (2nd. ed.). Chicago: University of Chicago Press.