The Bologna Framework

By now, the principles of the Bologna Process are well known. The 1999 Bologna Declaration set six short term objectives to establish a European Higher Education Area (EHEA): 1) adoption of a system of easily readable and comparable degrees, 2) adoption of a system essentially based on two main cycles, 3) establishment of a system of credits, 4) promotion of mobility, 5) promotion of European co-operation in quality assurance, and 6) promotion of the necessary European dimensions in higher education (Bologna Process 1999).

In the Follow-up Conferences, new principles (action lines) have been added: 7) lifelong learning (Prague 2001), 8) involving higher education institutions and students in the process (Prague 2001), 9) promoting the worldwide attractiveness of the European Higher Education Area (EHEA) (Prague 2001), and 10) linking education and research together (Berlin 2003). It can be argued that there is also the 11th action line, social mobility. It has evolved gradually within the Bologna Process. It was mentioned for the first time in the 2001 Prague Communiqué (as students’ equal opportunity to participate in international mobility), then linked to economic background of students as well as to gender inequalities in Berlin in 2003, and finally made one of the priorities of the Process in the Bergen 2005 Conference. In the London Conference, it was defined by the policy goal that “the student body entering, participating in and completing higher education at all levels should reflect the diversity of our populations” (see EACEA 2012, p. 71)¹.

However, in spite of the label “Bologna Process”, the process itself had begun already a year earlier. In May, 1998, the Ministers of Education of France, Germany, Italy and the United Kingdom met in Paris, to commemorate the 800th Anniversary of the University of Paris. After the

¹ It must be noticed, however, that during the process, the action lines have been reinterpreted constantly and linked together in different ways (see, for example, Quinlan and Berndtson 2012).
meeting, they gave out a joint declaration on “Harmonisation of the Architecture of the European Higher Education System” (Bologna Process 1998) and asked other European countries to join them in this endeavour. This led to the meeting of 29 European Ministers of Education in Bologna in the following year. The link between Sorbonne meeting and the Bologna Process can be seen in the fact that most of the current action lines were already included in the Sorbonne Declaration.

Furthermore, it must be noted that the action lines are mainly short term objectives in order to fulfil the main goals of the Process. In the Bologna Declaration, it is stated that the reforms are needed in order “to promote European citizens employability and the international competitiveness of the European higher education system” (Bologna Process 1999, my emphasis). These goals link the Bologna Process closely to the economic ideology which began to penetrate European higher education in the 1980s. The marketisation of education was already initiated by the British government under the Thatcher administration. Some of the same policies were adopted also in the Nordic countries and in the Netherlands in the late 1980s and early 1990s. This has created a hierarchical top-down system and led to the use of market mechanisms (e.g. performance-based funding) and quality assurance systems in steering higher education (Hansen 2011, 236).

The European Commission was accepted as a full member in the Process in the 2001 Prague Conference. It can be argued that this has changed many features of the reform. Most goals of the Bologna Process had been on the Commission’s agenda already before the Bologna Conference (Neave 2003), but the Commission’s competence in the area of education had been widely opposed in the 1980s, as education was regarded as a national affair. However, by initiating the Erasmus Programme in 1987 and launching the European Credit Transfer and Accumulation System (ECTS) to help student exchange the Commission had begun to influence European higher education policies. Then the Maastricht Treaty gave the Commission a right to encourage cooperation in education which it used in publishing various reports and funding different projects. One of these was the European pilot project for evaluating quality in higher education (1994-1995), which helped to launch the quality assurance principle in the European higher education. However, as a full member in the Bologna Process, the Commission has now been able to advance its goals more efficiently than before its membership.

The Bologna Process has also become increasingly bureaucratic. It is guided by the Bologna Follow-up Group (BFUG), which consists of representatives of the member countries and the European Commission. There are also eight consultative members: Council of Europe, UNESCO’s
European Centre for Higher Education, European University Association (EUA), European Students’ Union (ESU), European Association of Institutions in Higher Education (EURASHE), European Association for Quality Assurance in Higher Education (ENQA), Education International Pan-European Structure, and BUSINESSEUROPE. The BFUG has a Board and a Secretariat. In addition, there are several working groups and networks monitoring the implementation of the action lines. There are also national follow-up organisations in each participating country. Furthermore, the consultative members often organise their own conferences. As Bob Reinalda (2008, pp. 387-390) has argued, the Bologna Process has become in many ways a permanent intergovernmental organisation.

Explaining the Role of Research in the Bologna Process: Convergence of the Goals of the European University Association and the European Commission

This paper looks at the Bologna Process from one specific perspective, the relationship between education and research. The consultative members and the European Commission seem to have an important role in shaping the direction of the Bologna Process. This can be seen in the role of the European University Association and its impact on the recommendations for doctoral studies. As noted above, education and research became linked together in the Berlin Follow-up Conference as the tenth action line:

*European Higher Education Area and European Research Area – two pillars of the knowledge based society.* Conscious of the need to promote closer links between the EHEA and the ERA in a Europe of Knowledge, and of the importance of research as an integral part of higher education across Europe, Ministers consider it necessary to go beyond the present focus on two main cycles of higher education to include the doctoral level as the third cycle in the Bologna Process. They emphasise the importance of research and research training and the promotion of interdisciplinarity in maintaining and improving the quality of higher education and in enhancing the competitiveness of European higher education more generally. Ministers call for increased mobility at the doctoral and postdoctoral levels and encourage the institutions concerned to increase their cooperation in doctoral studies and the training of young researchers (Bologna 2003).

The new action line changed the position of graduate education in the Bologna Process as in the Sorbonne, Bologna and Prague Declarations, doctoral education had been understood as part of graduate education together with MA studies. The 1998 Sorbonne Declaration had stated that:
In the graduate cycle there would be a choice between a shorter master’s degree and a longer doctor’s degree, with possibilities to transfer from one to the other. In both graduate degrees, appropriate emphasis would be placed on research and autonomous work (Bologna Process 1998).

This was repeated in the 1999 Bologna Declaration about the two cycles, setting the target of:

Adoption of a system essentially based on two main cycles, undergraduate and graduate. Access to the second cycle shall require successful completion of first cycle studies, lasting a minimum of three years. The degree awarded after the first cycle shall also be relevant to the European labour market as an appropriate level of qualification. The second cycle should lead to the master and/or doctorate degree as in many European countries (Bologna Process 1999).

Why and how did the change happen? In studying the Bologna Process, three questions can be posed. First, why did the Process start? Who initiated it and what have been the interests of those advocating the reforms? Why have almost all European countries joined the Process? Secondly, how has the Process developed and why it has developed the way it has? Thirdly, what have been the consequences of the reform? It would be possible to ask also the fourth question, what will be the consequences of the Process in the longer perspective. To answer this question would be, however, partly a matter of speculation. In the following, I will try to give some answers to these questions focusing on the relationship between education and research.

Most studies on the rise of the Bologna Process agree that the interests of German and French higher education authorities found a common ground in the Bologna Process (e.g. Reinalda 2008). There was much dissatisfaction about higher education in Europe before the 1999 Bologna Conference, especially in France and Germany (and also e.g. in Italy). As it turned out to be difficult to realise higher education reforms within their own countries, the French and Germans initiated the Process at the European level. As the Process has now been joined by forty-seven European countries, apparently many countries have found the strategy fruitful for their own purposes. However, it would need more research to evaluate the interests of different countries, as it is not certain that all countries have similar goals. One sign of this is that the Process has developed unevenly around Europe (EACEA 2012). It is even difficult to get information about some countries in order to compare all European higher education systems. The national policy measures have been path dependent, with reforms based on existing structures and practices. This has resulted in different policies in the participant countries and for a complex policy arena with hundreds of actors producing countless reports on the state of the Bologna Process and the future of European
The Bologna Process is in many ways only a general policy framework, which allows different actors to pursue their own specific interests and policy objectives under its label.

In regard to the introduction of research on the Bologna agenda, a crucial change was due to the launching of the European Union’s Lisbon strategy and the European Research Area (ERA) in 2000. The strategy has strengthened the demands for curriculum, governance and funding reforms in European higher education, as higher education was seen as a vital mechanism in making Europe “the most competitive and dynamic knowledge-based economy in the world” by 2010. Although the Lisbon strategy has now been replaced by the EU 2020 strategy, the new strategy is based on the old one. However, the Commission’s increasing involvement in the Bologna Process has meant a convergence of the Bologna Process and the Lisbon strategy, with the emphasis of the Bologna shifting from curriculum reform to labour market issues:

Ministers take into due consideration the conclusions of the European Councils in Lisbon (2000) and Barcelona (2002) aimed at making Europe “the most competitive and dynamic knowledge-based economy in the world, capable of sustainable economic growth with more and better jobs and greater social cohesion” and calling for further action and closer co-operation in the context of the Bologna Process (Bologna Process 2003).

As employability has been the main goal (with international competitiveness) to be achieved with the creation of the European Higher Education Area, it can be argued that the goal of the Bologna process is not so much to develop academic curriculum, but to change the curriculum to adapt it to the requirements of the global labour market (Münch 2013).

However, the EUA has played a central role with the European Commission in promoting research as part of the Bologna Process. According to Georg Winckler, the President of the EUA, it was on a recommendation of the EUA that doctoral programmes were added as a third cycle on the Bologna agenda in Berlin (EUA 2005b, 4). Then, during 2004-2005, the EUA carried out a project on doctoral programmes in Europe with the European Commission’s support. In the final report (EUA 2005b), it was stated that, “[t]o achieve the ambitious Lisbon objectives, Europe both seeks and needs to increase the number of researchers and research related careers, and doctoral training programmes can be seen as a cornerstone in reaching such a goal” (EUA 2005b, 6). Furthermore, it was emphasised that “[w]ith major changes in a competitive and diversified global labour market, requiring more mobility, flexibility, adaptability and highly specified expertise, universities face a challenge to reform programmes in order to adapt to new conditions” (EUA 200b, 35).
The report showed a vast diversity in organising doctoral studies in different countries\textsuperscript{2}. There was a need to develop some basic principles for the third cycle. In order to do that the Bologna Seminar on “Doctoral Programmes for the European Knowledge Society” was organised in Salzburg in February, 2005 (on the initiative of the Austrian Federal Ministry of Education, Science and Culture, the German Federal Ministry of Education and Research and the EUA). In the seminar, the preliminary findings of the EUA project were discussed. As a result, the meeting declared ten basic principles for doctoral studies (EUA 2005a). The principles have become known as the “Salzburg principles”:

1. **The core component of doctoral training is the advancement of knowledge through original research.** At the same time it is recognised that doctoral training must increasingly meet the needs of an employment market that is wider than academia.

2. **Embedding in institutional strategies and policies:** universities as institutions need to assume responsibility for ensuring that the doctoral programmes and research training they offer are designed to meet new challenges and include appropriate professional career development opportunities.

3. **The importance of diversity:** the rich diversity of doctoral programmes in Europe - including joint doctorates - is a strength which has to be underpinned by quality and sound practice.

4. **Doctoral candidates as early stage researchers:** should be recognized as professionals – with commensurate rights - who make a key contribution to the creation of new knowledge.

5. **The crucial role of supervision and assessment:** in respect of individual doctoral candidates, arrangements for supervision and assessment should be based on a transparent contractual framework of shared responsibilities between doctoral candidates, supervisors and the institution (and where appropriate including other partners).

6. **Achieving critical mass:** Doctoral programmes should seek to achieve critical mass and should draw on different types of innovative practice being introduced in universities across Europe, bearing in mind that different solutions may be appropriate to different contexts and in particular across larger and smaller European countries. These range from graduate schools in major universities to international, national and regional collaboration between universities.

7. **Duration:** doctoral programmes should operate within an appropriate time duration (three to four years full-time as a rule).

8. **The promotion of innovative structures:** to meet the challenge of interdisciplinary training and the development of transferable skills.

\textsuperscript{2} The same diversity was revealed by the comparative study of nine European political science doctoral programmes (Goldsmith 2005, 65).
9. **Increasing mobility**: Doctoral programmes should seek to offer geographical as well as interdisciplinary and intersectoral mobility and international collaboration within an integrated framework of cooperation between universities and other partners.

10. **Ensuring appropriate funding**: the development of quality doctoral programmes and the successful completion by doctoral candidates requires appropriate and sustainable funding.

Furthermore, it was recommended that the principles should provide the basis for the further work of the BFUG and help to draft the coming Bergen Communiqué. The participants of the Salzburg Seminar also proposed that the Ministers in Bergen would call the EUA to prepare a report (under the BFUG) to further develop the principles for the Bologna Follow-up Conference in 2007.

Both recommendations were approved by the BFUG and the Ministers in Bergen. In the Bergen Communiqué, under the section **Further challenges and priorities Higher education and research**, it was stated that:

We underline the importance of higher education in further enhancing research and the importance of research in underpinning higher education for the economic and cultural development of our societies and for social cohesion. We note that the efforts to introduce structural change and improve the quality of teaching should not detract from the effort to strengthen research and innovation. We therefore emphasise the importance of research and research training in maintaining and improving the quality of and enhancing the competitiveness and attractiveness of the EHEA. With a view to achieving better results we recognise the need to improve the synergy between the higher education sector and other research sectors throughout our respective countries and between the EHEA and the European Research Area.

To achieve these objectives, doctoral level qualifications need to be fully aligned with the EHEA overarching framework for qualifications using the outcomes-based approach. The core component of doctoral training is the advancement of knowledge through original research. Considering the need for structured doctoral programmes and the need for transparent supervision and assessment, we note that the normal workload of the third cycle in most countries would correspond to 3-4 years full time.

We urge universities to ensure that their doctoral programmes promote interdisciplinary training and the development of transferable skills, thus meeting the needs of the wider employment market. We need to achieve an overall increase in the numbers of doctoral candidates taking up research careers within the EHEA. We consider participants in third cycle programmes both as students and as early stage researchers. We charge the Bologna Follow-up Group with inviting the European University Association, together with other interested partners, to prepare a report under the responsibility of the Follow-up Group on the further development of the
basic principles for doctoral programmes, to be presented to Ministers in 2007. Overregulation of doctoral programmes must be avoided (Bologna Process 2005).

As can be seen, the main Salzburg principles were included in the Communiqué: the advancement of knowledge through original research, the need for structured doctoral programmes, the need for transparent supervision and assessment, 3-4 years as a length of the third cycle, the need for interdisciplinary training, the development of transferable skills and doctoral students as early stage researchers. Furthermore, the EUA was given a task to prepare a report for the further development of the principles for doctoral programmes.

In this vein, the EUA organized another Bologna Seminar on Doctoral Programmes in 2006 (in Nice) in order to prepare recommendations for the London Communiqué (EUA 2006). The EUA prepared also a report on “Doctoral Programmes in Europe’s Universities: Achievements and Challenges” (EUA 2007). In the Nice seminar, participants emphasised the uniqueness of the third cycle in the European Higher Education Area. It was the advancement of knowledge through original research which made doctoral studies special. The conclusions of the seminar(EUA 2006) linked doctoral studies to other Bologna action lines, such as lifelong learning, internationalization, mobility (see also, EUA-DCE 2011), joint doctoral degrees, quality assurance (see also, Byrne, Jorgensen and Loukkola 2013), social dimension, interdisciplinary research and education as well as intersectoral programmes more firmly. There was not much to add to the Salzburg Principles, but it was noted with satisfaction that a range of innovative doctoral programmes around Europe were emerging to respond to the demands of the labour market. This view was based on the preliminary findings of the EUA report (EUA 2007). Referring also to the EUA Trends V Report, it was noted that 30% of European higher education institutions surveyed had informed that they had established a doctoral, graduate or research school.

That is why, in the 2007 London Follow-Conference, the Ministers could note that “good progress is being made at national and institutional levels towards our goal of an EHEA based on a three-cycle degree system”, while:

Closer alignment of the EHEA with the European Research Area (ERA) remains an important objective. We recognise the value of developing and maintaining a wide variety of doctoral programmes linked to the overarching qualifications framework for the EHEA, whilst avoiding overregulation. At the same time, we appreciate that enhancing provision in the third cycle and improving the status, career prospects and funding for early stage researchers are essential
preconditions for meeting Europe’s objectives of strengthening research capacity and improving the quality and competitiveness of European higher education.

We therefore invite our HEIs to reinforce their efforts to embed doctoral programmes in institutional strategies and policies, and to develop appropriate career paths and opportunities for doctoral candidates and early stage researchers.

We invite EUA to continue to support the sharing of experience among HEIs on the range of innovative doctoral programmes that are emerging across Europe as well as on other crucial issues such as transparent access arrangements, supervision and assessment procedures, the development of transferable skills and ways of enhancing employability. We will look for appropriate opportunities to encourage greater exchange of information on funding and other issues between our Governments as well as with other research funding bodies (Bologna Process 2007).

In the 2009 (Leuven/Louvain-la-Neuve) and 2012 (Bucharest) Follow-up Conferences, the cooperation between the EUA, the European Commission and the BFUG continued. In Leuven/Louvain-la-Neuve, it was demanded that, “[h]igher education should be based at all levels on state of the art research … thus fostering innovation and creativity in society”, while “[d]octoral programmes should provide high quality disciplinary research and increasingly be complemented by inter-disciplinary and inter-sectoral programmes” (Bologna Process 2009). The Bucharest meeting repeated these goals, emphasising how it is necessary that European higher education institutions ensure a strong link between research and teaching at all levels (Bologna Process 2012). Between the 2009 and 2012 Follow-up Conferences, the EUA also published “Salzburg II Recommendations” (EUA 2010). It was noted that:

In 2005, the Salzburg Principles were established in the Bologna Process as the basis of the reforms for doctoral education. In the half decade that has passed since then, Europe’s universities have carried out wide-ranging reforms in this area, most notably by establishing doctoral schools. The achievements and experiences of Europe’s universities affirm and enrich the original principles.

Otherwise the Salzburg II recommendations emphasised that doctoral candidates must have independence and flexibility in order to develop and succeed, as doctoral studies are highly individual. However, at the same time it was demanded that doctoral education must be in the hands of autonomous and accountable institutions “taking responsibility to cultivate the research mindset”. It was argued that doctoral education must be structured in order to create a supportive environment for early stage researchers and offer them wider opportunities. This was seen to require a critical mass and critical diversity of the environment.
The similarities between the goals of the EUA and the Commission can be seen in the Commission’s own “Principles for Innovative Doctoral Training” (European Commission 2011). These emphasise that doctoral education is of primary importance to the development of prosperous Europe, and that:

- The Commission will propose a common approach to help ensure that the next generation of doctorate holders can actively contribute to the Innovation Union. The common approach may include the recommendations that doctoral training should:
  - have a certain critical mass
  - include transferable skills training
  - respect the principles of the Charter & Code
  - lead doctoral candidates to acquire the ability to challenge disciplinary borders
  - encourage doctoral candidates to spend some research time abroad
  - encourage doctoral candidates to spend some research time in industry or other relevant private/public employment sectors.

Doctoral training can be organised in various ways depending on institutional profiles, national traditions, specific disciplines and availability of resources. The classical model of the master-apprentice relationship is gradually becoming less important and more and more universities are setting up doctoral schools that deliver structured programmes for cohorts of candidates. These programmes provide career development through coursework on disciplinary and transferable skills alongside their original research.

The only difference between the Commission and the EUA is the weight which is given to the cooperation between universities and industry. The EUA accepts that the knowledge society requires the creativity of the research mindset “for a number of different functions and careers, also beyond those directly related to research” (EUA 2010), but the Commission goes further, as “[t]o strengthen the links between academia and industry, and to develop research careers combining scientific excellence with business innovation”, it has been possible (as of 2012) to companies and academic partners to propose two new formats of PhD training "the European Industrial Doctorates" and the "Innovative Doctoral Programmes" (under the Marie Curie Actions). For instance, in the European Industrial Doctorate programme the researcher is enrolled in the academic doctoral programme, but s/he will also spend at least half of her/his time within the private sector ([http://ec.europa.eu/research/mariecurieactions/about-mca/actions/itn/](http://ec.europa.eu/research/mariecurieactions/about-mca/actions/itn/)).

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3 “The European Commission has adopted a European Charter for Researchers and a Code of Conduct for the Recruitment of Researchers. These two documents, addressed to researchers as well as to employers and funders in both the public and private sectors, are key elements in the European Union’s policy to make research an attractive career, which is a vital feature of its strategy to stimulate economic and employment growth” (see, [http://ec.europa.eu/euraxess/index.cfm/rights/whatIsAResearcher](http://ec.europa.eu/euraxess/index.cfm/rights/whatIsAResearcher)).
The development of the action line of education and research shows that its agenda has been drafted in collaboration between the European Union Association, the European Commission and the BFUG. It indicates that the European University Association has an authoritative position in regard to the third cycle, as research is what differentiates universities from non-doctoral higher education institutions. On the other hand, it seems that the EUA has taken into account the general Bologna agenda and has adapted its own goals to be compatible with it.

**Consequences and Contradictions**

In his General Rapporteur’s Report, Kirsti Koch Christensen, described discussions which were held in the 2005 Salzburg Meeting (Christensen 2005). An interesting disagreement arose in regard to the length of doctoral studies. Most of the participants thought that three years is too short a period and preferred four years. But the other question was, should doctoral students be allowed to study also part-time, if they would be working at the same time. As Christensen described the disagreement:

For some university representatives this was an unknown concept and they argued for full-time studies that allow young doctoral candidates to work together in a well established research environment rather than doing individual research. They stressed that Europe needs young researchers who will be able to compete in the global labour market. Advocates of part-time studies argued that in the era of changing demographic trends in Europe (decrease of childbirths and increase of aging populations), doctoral programmes should be considered a part of life-long learning in line with the Lisbon objectives (the importance of continuous education in the knowledge based society).

The disagreement reflects the change from the old European apprenticeship model to an American model with strictly defined courses. This is linked to the question of how strict doctoral programmes should be. Although the Bologna and EUA documents emphasise freedom and flexibility (which are essential for academic research), in the background there is a demand to teach transferable skills to ensure wider employability of doctoral candidates. These skills include “communication and presentation skills, writing skills, project and time management, human resources management, financial resources management, teamwork, risk and failure management, etc”, as “[i]ndustry seeks young researchers who are flexible, creative, communicative, entrepreneurial, and have good language, intercultural and social skills” (Christensen 2005).

It can be asked, however, how much the teaching of transferable skills narrows the time for creative research? In some ways doctoral studies are a zero-sum game. The academic depth of research and learning transferable skills are in contradiction with each other. This contradiction between depth
and breadth (Niemann and Heister 2010, 410) is a general problem concerning education in the Bologna Process. It seems that political obsessions of European decision makers are undermining the research agenda for doctoral studies (Berndtson 2013). The emphasis on vocational training is one of them. The problem with the Bologna reforms is that all programmes seem to be focused on training, rather than on reproducing future researchers. In spite of emphasising “education, research and innovation”, European universities are currently developed mainly as teaching institutions for vocational training, rather than as the centres of scientific research (Niemann and Heisner 2010, 411; Hansen 2011, 241). This means that there will be less theoretical and methodological training at universities in all cycles. The quality of research will suffer in the long run, as universities are educating future researchers with a narrow focus and restricted methodological skills.

The demand for more mobility and the creation of larger units with strong institutional leadership can also narrow the depth of doctoral studies. Mobility itself is an important academic value, which universities and scholars themselves have always emphasised. However, in regard to doctoral studies it has been argued that, “sometimes the means become more important than the ends and transform good ideas into wrong practices”, as “too much mobility entails huge costs of transaction” (Mény, 2010, 16). Doctoral students need a stable environment where they can benefit from a dedicated supervisor rather than different environments. A degree obtained from two universities may give a wider perspective to one’s studies, but research results will probably be narrower in depth.

The establishment of large units (with a critical mass) encouraging the development of interdisciplinary programmes, is also a political obsession of the decision makers. Universities are increasingly organising doctoral studies as interdisciplinary programmes. However, although it is important to learn from other disciplines and cooperate with scholars from other fields, a doctoral student needs also a firm disciplinary base for her/his studies. Again, there is a danger that research shows more breadth than depth.

It can also be asked, how much academic freedom there will be in hierarchical institutional units, as the supervision of doctoral candidates “must be a collective effort with clearly defined and written responsibilities of the main supervisor, supervisory team, doctoral candidate, doctoral school, research group and the institution” and “[i]n order to be accountable for the quality of doctoral programmes, institutions should develop indicators based on institutional priorities such as individual progression, net research time, completion rate, transferable skills, career tracking and
dissemination of research results for early stage researchers” (EUA 2010). The problem with the Bologna Process is that it has been a top-down process which has overlooked the experience of academic staff. The European Union Association represents the agenda of university administrations, not the experience of scholars.

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