THE INTERNATIONALISATION OF HIGHER EDUCATION: TOWARDS AN EXPLICIT POLICY

Summary by
Mr S. Vincent-Lancrin

Only twenty years ago, countries often saw student mobility as a way of reaching out to the world, hoping thereby to create elite international networks. Universities welcomed international students but rarely went out of their way to recruit them. Today, cross-border education is more often perceived as a lever for economic development. Between 1998 and 2003 the number of foreign students in the OECD area rose by 50% to reach 2 million students. Increased competition between countries and between institutions to attract foreign students and academics, as well as the emergence of new forms of cross-border education, represent a new context for policy. In addition, the benefits, particularly economic benefits arising from cross-border education, appear to have growing importance. This chapter looks at policies for the internationalisation of higher education, taking into account this new context and objectives.

Cross-border higher education provides countries with real educational, cultural, policy and economic opportunities. To take advantage of these, countries need to define an approach adapted to their situation and objectives, in a perspective that goes beyond the field of education alone. Policy needs to be linked to economic and social policies, since it requires policy instruments that lie outside the direct responsibility of the field of education, including visa and trade policies.

Four main approaches to cross-border higher education are identified. The mutual understanding approach mainly emphasises political, cultural, academic and development assistance goals. The skilled migration approach encompasses the goals of the mutual understanding approach, but also involves a more active and targeted approach to the recruitment of foreign students. It aims to attract talented students (and academics) to work in the host country’s economy, or to help make its higher education and research
sectors more competitive. The *revenue-generating approach* incorporates the goals of the mutual understanding and skilled migration approaches, but it also has directly commercial objectives. Under this approach, international students pay the full cost of their education, generally without public subsidies. The *capacity-building approach* encourages the use of imported higher education, however delivered, as a relatively quick way to build an emerging country’s capacity. Not all these approaches are equally within the reach of all countries, and each raises its own problems. The objective is not simply to promote export of education services. As several Asian and Middle Eastern countries have shown, importing educational services can be just as beneficial as exporting them.

The chapter raises many challenging policy questions. How can cross-border higher education equitably benefit both developed and developing countries? Although it can help the latter to build their economic and educational capacities, it could also lead to a brain drain and reduced assistance to post-secondary education. And what is the impact of cross-border education on national higher education systems and countries’ education policies in the fields of access, quality and public financing? What position should be adopted in non-English speaking countries regarding English as the language of instruction?

**GENDER DIFFERENCES IN STUDENT ENGAGEMENT WITH MATHEMATICS**

Summary by
Mr A. Schleicher

1. Great advances have been made in gender equality in education. In all OECD countries, younger women today are far more likely to have an upper secondary or tertiary qualification than women a generation ago. University-level graduation rates for women now equal or exceed those for men in two-thirds of the OECD countries. However, women remain persistently under-represented in areas such as mathematics and science. This chapter suggests that action in this area needs to be targeted at youth and, indeed, children.

2. While gender differences in student *performance* tend to be modest, there are marked differences between males and females in their *interest in* and *enjoyment of* mathematics, as well as in their self-related beliefs, emotions and learning strategies related to mathematics. 15-year old girls tend to report less confidence in their mathematical ability, and greater feelings of anxiety, helplessness and stress in mathematics classes than boys.

3. Learning depends on motivation and confidence as well as cognitive skills. So education systems that have raised the performance of girls in mathematics and science also need to foster strong interest by girls in these subjects. There are good grounds for this: high quality learning is time and effort-intensive. It involves control of the learning process as well as the explicit checking of relations between previously acquired knowledge and new information, the formulation of hypotheses about possible
connections and the testing of these hypotheses against the background of the new material. Learners will only put in the effort if they have a strong interest in a subject or if there is an external reward from performing well. Thus, students need to be willing to learn how to learn. From the perspective of teaching this implies that effective ways of learning – including goal setting, strategy selection and the control and evaluation of the learning process – can and should be fostered by the educational setting and by teachers for males and females alike. Motivation and self-confidence are therefore indispensable to outcomes that will foster lifelong learning.

4. Overall, the results suggest that education systems need to address aspects of attitudes and learning behaviours in relation to mathematics, particularly for females, and to consider this as a goal that is as central to the mission of education systems as cognitive instruction. This has implications both for the initial training and the professional development of teachers.

THE TEACHING WORKFORCE: MEETING ASPIRATIONS AND ENHANCING MOTIVATION

Summary by
Mr P. Santiago

Positive attitudes among teachers are a key priority for policy-makers given evidence that teaching performance is perhaps the main driver of student learning. Teacher motivation is also important for promoting school reform. This chapter investigates what matters to teachers and how best to motivate them. Research on work motivation is used to shed light on how both ‘intrinsic’ and ‘extrinsic’ motivation can promote work outcomes such as performance, satisfaction, and well-being. The analysis stresses that motivation underpins the success of both teachers’ work and the introduction of any renewal in schools. The central message is that teachers’ actions need to be self-motivated, resulting from their acceptance of and identification with the values and objectives of practices and regulations in schools.

Although pay is important, teacher policy needs to address a lot more than pay. Teachers place a lot of emphasis on the quality of their relations with students and colleagues, on feeling supported by school leaders, on good working conditions, and on opportunities to develop their skills. Teacher evaluation for improvement purposes could provide many opportunities for teachers’ work to be recognised and celebrated and help both teachers and schools to identify professional development priorities.

This chapter proposes four ways of improving teachers’ performance, satisfaction and well-being: (i) promoting the intrinsic motivation of teachers; (ii) fostering the self-motivation of teachers; (iii) making a balanced use of extrinsic rewards; and (iv) meeting the needs of teachers for good working conditions. These imply bringing greater challenge and variety to teaching, ensuring opportunities for professional growth, offering
constructive performance feedback, involving teachers in decision making and helping build a strong sense of professional identification and worth.

The teaching career would also benefit from greater diversification, which would help meet school needs and also provide more opportunities and recognition for teachers. Greater emphasis on school leadership would help address the need for teachers to feel valued and supported in their work. In addition, well-trained professional and administrative staff can help reduce the burden on teachers, better facilities for staff preparation and planning would help build collegiality, and more flexible working conditions, especially for more experienced teachers, would prevent career-burnout and retain important skills in schools.

**IMPROVING LEARNING THROUGH FORMATIVE ASSESSMENT**

Summary by
Ms J. Looney

This chapter examines how formative assessment – frequent, interactive assessments of student understanding and progress to identify learning needs and shape teaching – can help countries realise both quality and equity in educational outcomes. Between 2002 and 2004, the OECD examined formative assessment policy and practice in exemplary classrooms in lower secondary schools in eight systems (Australia [Queensland], three Canadian provinces, Denmark, England, Finland, Italy, New Zealand and Scotland). *Formative Assessment: Improving Learning in Secondary Classrooms* (OECD 2005) also included reviews of English-, French- and German-language literature on formative assessment.

Each of the case study countries has made important strides in advancing the practice of formative assessment. They are motivated by quantitative and qualitative evidence that teaching which incorporates formative assessment has helped to raise levels of student achievement, and has better enabled teachers to meet the needs of increasingly diverse student populations, helping to improve the equity of student outcomes.

- While each of the countries participating in the study has policies to promote the wider practice of formative assessment, policy can do more. Countries that use a mix of approaches and make important investments in promoting change and building capacity are likely to push changes much further.
- There is *legislation* promoting and supporting the practice of formative assessment and establishing it as a priority. There are efforts to encourage *the use of summative data for formative purposes*. *Guidelines* on effective teaching and formative assessment have been embedded in the national curriculum and other materials. The *provision of tools and exemplars* supports effective formative assessment. Investments in *special initiatives and innovative programmes* incorporating formative assessment approaches. There is also *teacher professional development* for formative assessment. All education systems will need to strengthen the policy mix and to make
deeper investments if they are to promote real changes in teaching and assessment throughout education systems.

Countries will also need to better align macro- and micro-level policy approaches. At the most basic level, alignment means that education stakeholders ensure that policies do not compete with each other. At a more sophisticated level, the elements of formative and summative assessment reinforce each other. More consistent use of formative assessment throughout education systems may help stakeholders address the barriers to its wider practice in classrooms.

SPECIAL FOCUS

HIGHER EDUCATION: QUALITY, EQUITY AND EFFICIENCY

by
Meeting of OECD Education Ministers
Athens, Greece
27-28 June 2006

This chapter draws together four documents emerging from the Meeting of OECD Education Ministers held in Athens on 27-28 June 2006. The first document is the chair’s summary of discussions at the meeting. It describes how ministers agreed to go beyond growth by making higher education not just bigger but also better. Reforms are needed in six areas: to improve funding, to make higher education more equitable, to gain a clearer focus on what students learn, to promote responsiveness and diversity, to support research and innovation, and to devise an effective response to growing migration and internationalisation.

The second document is the speech by the new Secretary-General of the OECD, Angel Gurría. He reminded the meeting of how international debate has become central in higher education. This is because of new international policy instruments, like the European Bologna Process, because researchers and students are working and studying outside their home countries, and because of global competition for high-level skills. He argued that reform of funding is needed urgently, particularly in those countries where higher education is publicly funded but inadequately resourced to meet the costs of expansion. Mr. Gurría gave particular emphasis to the need for better measurement of outcomes in higher education, proposing a “PISA for higher education” to survey the skills of students.

The third document is the issues paper used to frame debate at the meeting. It covers the factors affecting the future of higher education, including technology, globalisation, demography, and governance. It looks at the objectives of higher education and the implications for governance, the question of who should pay for higher education,
whether there might be better ways to measure quality in higher education, and how we might improve its contribution to the economy.

The final document provides a range of indicators in graphical form. These indicators cover the broader social and economic context; access, participation and progression; expenditure on higher education; economic returns; and internationalisation.