OECD Report Warns of Growing Risk of Teacher Shortages in OECD Countries

Teacher shortages may become a policy challenge for many OECD countries in the years to come, as student enrolment levels rise while older teachers retire and not enough younger people join the profession, according to the 2003 edition of the OECD’s Education at a Glance.

In 15 out of 19 OECD countries for which data are available, most primary school teachers are at least 40 years old, the report says. In Italy and Germany almost half of secondary teachers are aged over 50 and in Sweden, Iceland, the Netherlands, Norway, Finland and New Zealand still more than one third are.

These countries will face particular challenges in recruiting new teachers to avoid future shortages in teaching staff. Compared with 1998, the average proportion of teachers aged 50 years or over increased on average by 1.8 percentage points in secondary education and in Finland, Germany, Ireland and the United Kingdom by more than 4 percentage points, according to the OECD’s annual compendium of comparative educational statistics.

The statistics in Education at a Glance provide a basis for policy debate and decisions in the world’s most developed countries. This year, the report highlights concerns about future teacher supply. Pay can be one of several factors that distort the flow of people into and out of the teaching profession, the report observes.

“The demography of teachers is becoming a major concern in many OECD countries, particularly in those countries where student enrolment is expected to expand further. Ensuring that there will be enough skilled teachers to educate all children is an important policy issue.”

In the five years from 1996 to 2001, teachers’ salaries grew faster than GDP per capita, a common measure of economic well-being, in the Czech Republic, Italy, Japan, Mexico and New Zealand. But in most countries they grew more slowly than GDP per capita and in some countries they actually fell.

A survey of upper secondary schools in 14 OECD countries showed an average of 12% of teaching posts to be vacant at the start of the 2001/2002 school year, and an average of 14% of full-time teachers and 31% of part-time teachers in these schools failed to fully comply with official training and qualification requirements. Science, technology and computer sciences, mathematics and foreign languages were cited as the areas where hiring difficulties were most acute.

The degrees of freedom that schools have in selecting their staff varies widely: In Belgium (Flemish Community), Denmark, Hungary, Norway and Sweden, hiring of new teachers at the upper secondary level is generally the school’s responsibility whereas in Italy, Portugal and Spain, this is only the case in schools covering 25% or fewer of upper secondary students.
Another issue affecting education performances is the availability and use of information and communications technologies (ICT). In 1990, most upper secondary schools had yet to introduce basic computer systems for educational purposes; today, almost all have done so, with access to Internet and e-mail for most by the end of the 1990s.

However, the take-up of new technologies has been far from uniform, and the availability of computers does not necessarily guarantee their effective use. In the same 14 OECD countries, an average 63% of upper secondary students attended schools where principals reported teachers’ lack of knowledge and skills as an obstacle to successful ICT implementation, and this problem was biggest in France and Norway.

On average, a typical upper secondary school had one computer for every nine students. But this ratio varied widely between countries, from three students per computer in Denmark and Sweden to more than 15 students per computer in Mexico and Spain.

At primary level, meanwhile, class sizes in OECD countries continue to vary widely, from 36 pupils per class in Korea to fewer than 18 in Greece, Iceland and Luxembourg. As for the number of teaching hours per year in public primary schools, it ranges from 1,139 hours in the U.S. and nearly 1,000 hours in New Zealand to 660 or less in the Czech Republic, Denmark, Finland, Iceland, Japan, the Slovak Republic and Turkey.

Another issue that this year’s edition of Education at a Glance draws attention to are changes in the gender balance in educational aspirations and outcomes. The 1990s was the decade when women moved ahead of men in terms of their educational attainment. In most OECD countries, young women are now more likely than young men to obtain first degrees from university-level institutions: only in three countries, Japan, Switzerland and Turkey, is the proportion of young men obtaining first degrees significantly higher than that of young women. In the past, men typically had better access, and in 1990 men still had higher university-level graduation rates than women in half the countries with comparable data.

Nevertheless, there remain gender discrepancies in educational and career choices, with young men still favouring physics, mathematics and engineering based courses at university, and young women opting for the social sciences, health and teaching-related courses: In the humanities, arts, education, health and welfare, an average of more than two thirds of the university-level graduates are women, whereas there are less than one third in mathematics and computer science and less than one quarter in engineering, manufacturing and construction. Men are also more likely than women to earn advanced research qualifications, such as doctorates.

Girls were also better readers by age 15 in every one of the 43 countries taking part in the OECD’s “PISA” survey of 15 year olds’ performance in 2000. In about half of the countries, boys remained ahead in mathematical literacy, but here the differences were much smaller, and in science there were few significant differences. In 40 out of these 43 countries, according to new analysis of “PISA” survey data, 15-year-old girls also reported higher expectation towards their future occupations than boys. However, mirroring the picture of current graduates in universities, career expectations of boys were far more often associated with physics, mathematics or engineering (on average 18% of boys versus 5% of girls) while girls more frequently expected occupations related to life sciences and health (20% of girls compared to only 7% of boys).

Education at a Glance 2003 is available to journalists on the OECD’s password-protected website: http://www.oecd.org/media/journalists/journalists.htm. For further information, journalists are invited to contact the OECD’s Media Relations Division (tel. [33] 1 45 24 97 00 or news.contact@oecd.org).