



Press Release Immediate 14th August 2008

CaSE PR 08/08

Campaign for Science & Engineering congratulates increasing numbers of A level students in all the sciences and mathematics

CaSE was delighted that the small rises seen in last year's A level entries into physics and chemistry were sustained this year and extended to biology. Entries in biology increased by 1447, chemistry by 1395 and physics by 630. CaSE particularly celebrated the combined increase of 5700 students in mathematics and further mathematics.

However, CaSE's Assistant Director, Dr Hilary Leever, urged caution:

"While we are obviously delighted to see these rises in the sciences and mathematics, the proportion of actual entries has unfortunately not increased in any of the sciences. The increases reflect an overall rise in the number of entries. There was an increase in the proportion of entries that were mathematics and further mathematics.

Gender differences

"We are concerned that gender differences have been accentuated this year with just 46 of the 630 additional entries in physics being attributed to females and 239 out of the 1395 in chemistry. This is really disappointing given recent efforts excite girls about science and also given how well they actually perform; females outperform males in mathematics and all the sciences and particularly in physics. Gender balances did improve in mathematics, with more female candidates and in biology with more male candidates.

"We are relieved that students are starting to return to science and mathematics. We need to see these increases sustained and enlarged to develop the talent needed by our knowledge-based economy. The tide may have turned but it was a very long way out. It is important to remember that physics was the most popular science A level in the 1980s with more than 40,000 students, compared was today's 28,000.

Teaching

"We hope that the students who received their A level results today will go onto study and graduate in science, engineering and mathematics, and as these numbers pick-up, more graduates become available for teacher training. Applications for teacher training in biology, chemistry and physics are down compared to last year despite the good job security that teaching now offers in comparison to other sectors. We need more new teachers to achieve long-term improvements.

Grades

"Overall 26% of candidates received A grades but more did so in the sciences and mathematics, averaging 27% A grades in biology, 34% in chemistry, 32% in physics, 44% in mathematics and 58% in further mathematics. While it is wonderful that students get such high grades in science and mathematics, it does suggest that there are many more students who could be taking these subjects.

Incentives

"The Government must continue in its drive to interest students in science and mathematics. There are many great new initiatives, but even taken all together they are simply not having enough impact. We need to take a more radical approach to increase uptake of science and mathematics in schools and beyond. That is why **CaSE proposes awarding higher UCAS points for science and mathematics to encourage more students to study these strategically important subjects.**"

ENDS

Notes to Editors

1. Contact: Dr Hilary Leever, Assistant Director, hilary@sciencecampaign.org.uk, 020 7679 4995, 07905 304702.

2. The Campaign for Science & Engineering (CaSE) is a pressure group aiming to improve the scientific and engineering health of the UK. Our objective is to communicate to Parliament and the nation as a whole the economic and cultural importance of science and engineering, and the vital need for its funding by government and industry. CaSE is supported by its members, which includes individuals, corporations, universities and learned societies. Further information on CaSE can be found at:
<http://www.sciencecampaign.org.uk>

3. For more information on higher UCAS points for science and mathematics see
<http://www.sciencecampaign.org.uk/press/releases/2008/pr040808.pdf>

4. All figures can be viewed at www.jcq.org.uk.