End-of-life decisions in Dutch paediatric practice

Sir—we wish to reply to the various responses (Sept 13, p 816) to our July 26 paper on end-of-life decisions in neonatology. Philip Howard refers inaccurately to our data. Among the infants in whom life-sustaining treatment was stopped, the percentage to whom drugs were administered with the explicit intention of hastening death was 14% (8% of 57%), and not 48% as Howard suggests. Furthermore, Howard suggests that only 23% of the neonatologists and 6% of the other paediatricians in our survey felt that decisions to administer drugs with the explicit intention of ending life should be reviewed after the death, but there were another 42% and 59%, respectively, who preferred review both before and after the act. The autonomy Dutch paediatricians are supposed to expect for end-of-life decisions is not reflected in our finding that 75% of the neonatologists and 59% of the paediatricians support review of these acts by a committee not restricted to medical professionals. Transparency of the decision-making process in this field is widely endorsed in our country where active euthanasia is emphatically not "tacitly approved", but widely discussed.

We agree with A P Cole that doctors should "uphold the law where life is concerned". According to Dutch jurisdiction, in exceptional circumstances the administration of a drug to an infant by a doctor with the explicit intention of ending life may be justified by medical necessity. Therefore, under Dutch law, doctors have a specific, professional responsibility towards the life and death of severely ill infants, and they are, in that respect, different from other groups of citizens.

We cannot find any clue for Marc Grassin and colleagues’ claim that the Dutch notification procedure for physician-assisted death is not used in most end-of-life decisions, "because patients are not regarded as incompetent to give consent". However, we do agree that parents may endure lasting psychological effects as a result of the responsibility for an end-of-life decision for their child, although it is not clear to what extent psychological effects affect the decision-making process. Currently, we are examining parental opinions and feelings about medical decisions concerning the life and death of their child.

We believe that the widely endorsed need for medical professionals to discuss their increasing responsibilities towards the life and death of severely ill patients is not done justice by Margaret White’s suggestion that without rigorous legal prosecution any sound practice is impossible.

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Sex and examination results

Sir—A G Acheson (Sept 27, p 964) reports that male medical students are at a disadvantage in medical examinations in UK. This is an important issue in terms of strategies in medical education. We studied the association between sex and the examination results in two Japanese national examinations: the national examination for medical practitioners which gives a licence of physician and the national bar examination which gives a licence of legal profession. The proportion of successful applicants in each examination was significantly higher among women than among men (national examination for physician: 93.5% vs 86.3%; national bar examination: 3.6% vs 2.7%).

I suppose that present-day female students are more diligent with regard to examination questions that have correct answers. However, it remains unknown whether sex has a role in solving problems for which there is not necessarily a correct answer, such as the questions physicians face in their daily clinical or research work.

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Sir—A G Acheson1 and others2 have shown that the gender and ethnic background of medical students affects their pass rates in some medical schools. In the Department of Child Health of the University of Queensland, where students do a 10-week posting in the final year, we have not found a significant difference in the male/female pass rates, but we have elicited other and interesting differences related to gender, age, and ethnic background.

Many of our medical students are from South-East Asia.

We have analysed the results of terminal examinations in the department for the four terms in each of the years 1993, 1994, and 1995—a total of 658 students. In each term examination there was a multiple-choice section, with 20 multiple true/false questions, each with four items (statements). Each statement could be answered true, false, or don’t know. We have calculated for each term the number of correct responses (true for a true statement, false for a false statement), wrong responses (true for a false statement and false for a true statement), and the number of don’t know responses. The numbers of responses were analysed with a method that sums the significance of the responses for each term to find the overall effect of gender, age, and mother tongue.

Some variables, for example, sex and first language English/non-English, were inherently binary. With each of the other variables, for example, age, number of correct responses, the median value was found for each of the 12 terms. For each term, we constructed two-by-two tables for each pair of variables by counting the number of responses on-and-above the median and the number below the median and putting these numbers in rows and columns. A modification of the Cochran test3 was used to combine the results from the 12 terms into one value which gave the overall probability of the null hypothesis and the direction of the interaction. The inclusion of values on the median into the upper group increased the expected number above the 50%, but this does not invalidate the results. For brevity, high means on-and-above the median, and low means below the median.

Compared with female students, male students had a trend towards fewer correct responses (50% men and high scores vs 56% women, p=0.053, significantly more wrong responses (60% men had high scores vs 49% women, p=0.003), and significantly fewer don’t know responses (52% men had high scores vs 57% women, p=0.04). Age had no significant effect on correct and don’t know responses, but older students had more wrong responses (older students had 62% high wrong responses vs 52% high wrong responses in younger students). The first language had no significant effect on correct and wrong responses, but those whose mother tongue was not English had fewer don’t know responses (36% of students with English as mother tongue had high don’t know responses vs 47% for those whose mother tongue