11 JUNE 1988

Points

Radiation and children

Drs H M LEE, A L HINE, and P J SHORVON (Department of Radiology, Central Middlesex Hospital, London NW10 7NS) write: Drs Richard M Darwood and Christine M Hall draw our attention to the exposure of children to ionising radiation (7 May, p 1277). As well as minimising the dose of radiation received by children, it is important to avoid fetal irradiation as much as possible. Ultrasound examination has eliminated the need for antenatal radiographic examination of the fetus. Prepartum pelvimetry, however, is still employed, especially in some cases of breech presentation. To reduce the radiation dose to the fetus during pelvimetry we now use a digital radiograph obtained as a "scout" film on our computerised tomography scanner. This is quicker and more comfortable for the patient than conventional pelvimetry and takes up very little scanner time. It results in approximately a tenfold reduction in radiation dose.

1 Suramo I, Torniainen P, Jouppila P, et al. A low-dose CT pelvimetry. Br J Radiol 1984;57:35-7.

Mr D W SARLL (Department of Dental Health, Salford, and Trafford Health Authorities, Manchester M30 0NJ) writes: Drs Richard M Dawood and Christine M Hall (7 May, p 1277) remind us of the need to limit as far as we can the taking of radiographs for children and cast doubt on the belief that the dose of radiation will be as small as possible. Techniques and quality control also vary widely in dental diagnostic procedures. In England and Wales in 1987 over 2500 000 radiographs were taken in the general dental services for children aged 0-16 years. Little is known about standards, but the Nuffield report on dental education commented that they were poor in Britain, and in the United States 75% of radiographs were shown to be unsatisfactory.2 Dentists could contribute to a substantial reduction in dose if caries were diagnosed by other means, and Mitropoulos has shown that fibreoptic transillumination is a satisfactory alternative for both screening inspections and diagnoses in the dental surgery. With regard to techniques and the quality of processing, the North Western Regional Health Authority has funded a study of the problems in general dental practices to start in the autumn.

- Nuffield Foundation. Dental education: the report of a committee of inquiry. London: Nuffield Foundation, 1980.
- 2 Beidman RW, Johnson ON, Alcox RW. A study to develop a rating system and evaluate dental radiographs submitted to a third party. J Am Dent Assoc 1976;93:1010-3.

 3 Mitropoulos CM. A comparison of fibre-optic transillumination
- with bitewing radiographs. Br Dent J 1985;159:21-3.

Walking sticks

Drs R L KIRBY and P J POTTER (Division of Physical Medicine and Rehabilitation, Dalhousie University, Halifax, Nova Scotia B3H 4K4) write: Dr G P Mulley (13 February, p 475) notes that the rubber tips of walking sticks slip on snow and ice, but in Canada there are at least three adaptations available which improve friction on ice and can be inactivated when indoors. We often suggest that elderly patients should also use rubber overshoes with metal studs on the soles.

Körner, nomenclature, and SNOMED

Dr I P WALSWORTH-BELL (North Western Regional Health Authority, Manchester M60 7LP) writes: Mr Richard Earlam (26 March, p 903) discusses issues which have been considered recently by the regional specialists in community medicine with an interest in information and research. It is not quite fair to say that SNOMED is unknown and untested in the United Kingdom. At least three English regions are using SNOMED (two of them extensively), and two are about to implement SNOMED on a wide scale. In only two regions are there computer user groups to help doctors understand the full potential of the system, agree definitions where there is ambiguity, and amend or extend the system where there is insufficient detail. We suggest that the royal colleges set up discussions with taxonomists and information experts to develop nomenclatures for use in clinical specialties in Britain. Only if we do this can we hope to escape from the rigidity of uniaxial systems and allow doctors to communicate among themselves and with other disciplines about what health care is all about and what the implications of our decisions are, not for the managers but for the patients.

Eye injuries caused by elasticated straps

Dr J P DIAMOND (Cheltenham General Hospital, Gloucestershire GL53 7AN) writes: Mr R H Gray and colleagues (16 April, p 1097) draw our attention to the potential for eye injury from elastic luggage straps. They suggest that changing the traditional wire hook to a sprung gate clip, as used on dog leads, would increase their safety. I have seen a case which demonstrates that even with such a clip elastic straps remain a threat. A 37 year old man was struck on the left eye by a sprung gate clip attached to the end of an elastic dog lead. It is not certain how it became detached from the dog. He sustained a hyphaema, vitreous haemorrhage, optic nerve damage, and a retinodialysis and needed cryotherapy for the retinodialysis. Three months later his visual acuity was 6/18. Analysis of the lead using a 50 Hz oscillometer showed an average maximum velocity on free recoil of 0.69 m/s. An equivalent value for the luggage strap was 1.15 m/s. The metal clip attached to the dog lead weighed 70 g while that on the luggage strap weighed 30 g. The luggage strap had more kinetic energy but less momentum than the dog lead. It is not certain which parameter correlates most closely with the potential for eye injury.

Early detection of visual defects in infancy

Dr P A GARDINER (Guy's Hospital, London SE1 9RT) writes: Drs D M B Hall and Susan M Hall contradict themselves in saying that screening 3 year olds produces many false referrals and then stating that a single letter test misses amblyopia. A properly conducted single letter test at this age gives very clear, but rather late, indication of a discrepancy in vision between the eyes which justifies referral. However enlightened or wealthy a parent may be, virtually none discover unilateral visual defects in their children for themselves. One of the commonest causes of amblyopia is a unilateral refractive error so the authors' statement that refraction is of only marginal benefit is also misleading. As for their statement about the ability of parents to detect visual defects at almost any age, no parent, in my experience, has ever reported that their 4 or 5 year old child has diplopia, yet the child will describe this with great accuracy if asked the question. Improperly done screening is not a reason for abandoning it but rather for improving it. Listening to parents, however carefully, will fail to uncover most uniocular visual defects and many binocular ones.

Meningococcal septicaemia and meningitis

Dr Paul E Slater (Department of Epidemiology, Ministry of Health, Jerusalem, Israel) writes: In his otherwise excellent leading article Dr G Venkat Raman (23 April, p 1141) omits an essential step in the doctor's handling of a case of infectious disease prompt notification by telephone of the public health officer. The decision to give prophylactic treatment to defined contacts is always important as the incidence of disease in intimate contacts may exceed 3%.1 When there is a rising incidence of a disease, an atmosphere of worry fed by the media, and pressure from the public it is even more important to determine whom not to treat prophylactically,² and this is a decision for the broad shouldered public health expert. Although opinions may vary slightly, all agree that a family or community contact of a patient with meningococcal disease is a person who has spent hours in the company of the patient in the days before the appearance of the clinical illness.2-4 Casual contact, such as a handshake or having a cup of coffee together, does not warrant prophylactic treatment. Moreover, second degree contacts—namely, contacts of contacts—do not need chemoprophylaxis, no matter how worrisome the outbreak or how severe the disease in the index case. In a recent instance no fewer than 430 members (almost half the population) of a kibbutz received prophylaxis with rifampicin after the death of an infant from meningitis with sepsis, thought to be either meningococcal or caused by Haemophilus influenzae type b. The district health officer was not contacted, and the local physician thought it appropriate to define the population needing prophylaxis broadly because a kibbutz is "really one big family. There were half a dozen mild adverse reactions to the rifampicin, all in people who did not need treatment in the first place, and we have no way of knowing how many organisms newly resistant to rifampicin were released on to an unsuspecting world.⁵ The public health physician is an essential member of the team handling a case of suspected meningococcal disease, and his or her being apprised of the existence of a case should not be delayed past the moment when the ill patient is transferred to hospital.

- Greenwood BM. Selective primary health care: strategies for control of disease in the developing world. XIII. Acute bacterial meningitis. Rev Infect Dis 1984;6:374-89.
- 2 Riordan T, Jones DM. Chemoprophylaxis of meningococcal meningitis. Communicable Disease Report 1986; No 4:3-4.
- 3 Immunization Practices Advisory Committee. Meningococcal vaccines. MMWR 1985;34:255-9.
- 4 Committee on Infectious Diseases of the American Academy of Pediatrics. Report of the committee on infectious diseases. 20th ed. Illinois: American Academy of Pediatrics, 1986:246.
- Weidmer CE, Dunkel TB, Pettyjohn FS, Smith CD, Leibovitz A. Effectiveness of rifampicin in eradicating the meningococcal carrier state in a closed population: emergence of resistant strains. \mathcal{J} Infect Dis 1971;124:172-8.

Alcohol and mortality

Drs Robyn N Norton and Marsha Y Morgan (Royal Free Hospital, London NW3 2QG) write: Dr Sven Andreasson and colleagues (9 April, p 1021) found a strong association between alcohol consumption and 15 year mortality in a cohort of Swedish conscripts aged 18 to 19 years at recruitment. Violent deaths including suicide, traffic accidents, poisonings, drownings, falls, and homicide accounted for 75% of all deaths recorded. Caution should be exercised, however, in extrapolating from these data to the situation in other countries. In England and Wales 29% of the 3033 deaths recorded in 1984 in men aged 25 to 34 years were due to violence. This is a considerably smaller proportion than in Sweden, where in 1984, 66% of the 674 deaths in this age group resulted from violence. Overall, the rate of violent death for men in this age group in England and Wales was 878 per million compared with a rate of 2014 per million in Sweden. Even if the association found in Sweden between alcohol and violent death pertains in Britain the proportion of deaths from violence and the overall proportion of deaths associated with alcohol consumption are unlikely to be the same.

1 World Health Organisation. World health statistics annual 1986. Geneva: WHO, 1986.

Divided we fall

Dr B E Eyes (Fazakerley Hospital, Liverpool L97AL) writes: Mr J D Hamlett describes the problems faced by his specialty of obstetrics and gynaecology (30 April, p 1256), and I am not in a position to comment on those problems. I do, however, take exception to his implication that radiologists have taken the "easy option" and are hence lazy and overpaid in comparison with himself. The explosion in new imaging and interventional techniques which has taken place over the past decade or so has been achieved with little or no increase in staff. If Mr Hamlett seeks support from his colleagues he would do well not to sour relationships with them. We are all employed by the same health service and should present a united front in our efforts to gain improvements. The airing of petty inter-specialty jealousies will do nothing to achieve this.