LETTERS TO
THE EDITOR

Neural tube defects and zinc

EDITOR,—I read the article by Bound et al on the involvement of deprivation and environmental lead in neural tube defects (NTDs) in the journal with great interest.1 They suggested that lead is a possible cause of NTDs, especially anencephaly, either by direct action on rapidly developing nervous tissue or by acting indirectly by causing zinc deficiency with secondary folate deficiency. Lead reduces the bioavailability of zinc from food and the folate uptake is reduced by secondary zinc deficiency. They pointed out that further investigation is needed to study the role of zinc deficiency in the aetiology of NTDs.2

Severe first point out, from epidemiological evidence, a possible relationship between zinc deficiency and central nervous system malformation.3 In fact, the essential role of zinc in embryonic development and a relationship between maternal zinc deficiency and NTDs have been the subject of several studies.

Furthermore, in a genetic zinc deficiency disorder, acrocerebritis enteropathica, there is severe intestinal mucosal atrophy that can be reversed by effective oral zinc supplementation. In seven pregnancies in patients with acrocerebritis enteropathica, there was one spontaneous abortion and two major congenital malformations.4 Conversely, pregnancy outcome was good when a patient with acrocerebritis enteropathica was given supplemental zinc throughout her pregnancy. A case of a nutritionally zinc deficient young Turkish woman was reported who had previously delivered two anencephalic stillborn infants. After zinc supplementation she delivered a normal full term child.5

Our recent report concerning maternal plasma zinc concentrations after an oral zinc tolerance test in pregnancies associated with NTDs in Turkey showed that some of the affected women had defective zinc absorption due to chronic zinc deficiency, which returned to normal after zinc supplementation.6 Four affected women gave birth to normal infants; only one infant had closed spina bifida.7

Previous data and findings in human studies are evidence for the possible role of zinc metabolism at least in some of the mothers of babies with NTDs. NEJAT AKAR

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Dr Bound comments:
I would like to thank Dr Akar for his interesting letter. We knew of some of the references associating NTDs with zinc deficiency, but were not aware if recent work had shown it to act directly or by causing folate deficiency. Our statement that further investigation was needed referred primarily to the need to assess by reliable methods the zinc and folate status of mothers of future cases.


Integrated management of childhood infections and malnutrition

EDITOR,—The article by Campbell and Gove was timely and excellent. I am working in Bolivia to implement the programme developed by the World Health Organisation (WHO), “Integrated Management of Childhood Illness” (IMCI), as a means to decrease the high morbimortality in children less than 5 years old due to the most common illnesses in each region by appropriate and integrated management.1

The programme has been adapted to the needs of Bolivia and we have already run a workshop, with the participation of paediatricians from all over the country. The Bolivian Health Department is very enthusiastic to start the IMCI programme as soon as possible and is one of the first Latin American countries adopting it.2

The main paediatric health problems in Bolivia are respiratory infections, diarrhoeal diseases, tuberculosis, malnutrition, anaemia, malaria, and infections in the newborn period.

Right now the Health Department, the Paediatric Society, WHO/Pan American Health Organisation, Unicef, US Agency for International Development, and the Bolivian medical schools are working together to make possible a full scale application of the programme. We have just held a workshop with the participation of the three Bolivian medical schools to analyse the possibility of incorporating the IMCI programme in the regular training of medical students. This way we could reduce the cost of training graduate physicians and provide doctors coming out of medical school with a good knowledge of the evaluation and treatment of patients.

I attended a consultative meeting held in 1996 by the WHO in Geneva, with other experts from around the world, where the feasibility of applying this programme in medical schools in underdeveloped countries was discussed, and we all agreed with the importance of incorporating the programme at different levels of the medical school curricula.

It is important to emphasise the input of developing countries to ensure a scientific basis behind these programmes and, as Campbell and Gove said, to be aware of the problems faced by physicians working in underdeveloped countries. Also, when training foreign students, both teachers and students should learn about the integrated management of childhood illnesses, something that many standard textbooks do not mention.

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Addendum: as of January 1998, the IMCI programme is being implemented in our medical schools.


Head lice in schoolchildren

EDITOR,—In his recent letter, Charlton raises concern that head lice can be transmitted on combs and brushes.1 We agree this is so in certain circumstances: healthy lice, forcibly removed from the head will re-establish if they are allowed back on a head within one or two days of removal. Lice can be caught on a comb at one stroke and returned to the head at another. Clean and lice are undamaged by combing. Combing dry hair can propel lice by electrostatic charge through the air. If they land unnoticed on a person’s clothing or skin they will climb up to the head.

Thoroughly wet lice, however, appear dead and remain motionless until they dry off, which takes some time especially if they are bathed in ordinary hair conditioner; this provides ample time to remove them from a comb and dispose of them before they reactivate. The “bug busting” method mentioned in our review is entirely performed in wet hair and the carer is instructed to examine the comb for lice and remove them with each stroke.2 This can usually be done by wiping on kitchen paper or rinsing; if any lice lodge between the teeth, a cocktail stick or nailbrush will ease them out. A white plastic cape is provided in the Bug Buster Kit to protect the patient and because any lice landing there can be easily wiped off. We agree that the education of hairdressers in these facts is important.

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In the six years since the publication of the first edition of this report it is unlikely that many of the abnormal findings have become truly comforting when faced with the request to provide a medical opinion as to whether a child has been sexually abused. However, much has been learnt which if not allowing us to feel more confident in our attempts to meet the needs of this group of children.

An increasing literature concerned with normal and abnormal findings on examination as well as with examples of good models of practice is reflected in the increase by one third in the size of the report. The number of cited references increases from 38 to 60. It is no surprise that there is a marked increase in material cover the subjects of normal anatomy and variants in the appearance of female genitalia together with the size of the hymenal orifice. The inclusion of colour photos from colposcopy, rather than line drawings, gives the reader a far more accurate understanding of many points discussed in the text. Interestingly the working party falls short of positively encouraging the use of the colposcope, which in many cases can play an important role in diagnosis.

The controversy surrounding the significance of the presence or absence of anal dilatation appears to have settled. This edition of the report makes subtle but significant changes in its summary of signs in this respect, suggesting that an increased diameter of dilatation (15 mm rather than 10 mm) should be used as a threshold for suspicion and more importantly emphasising that the finding should be reproducible.

Another area in which the second edition of the report has grown is that of the diagnosis and management of sexually transmitted disease. There is a detailed and comprehen-

Paediatric MCQ Revision for MRCP and MRCPCH consists of five practice examinations, each with 60 questions, followed by explanatory notes. The format is the same as for the part I, thus allowing practice under exam conditions, and the question topics occur randomly, as in the exam. However, the main advantage of this book over its competitors is that there is both a general topic index (for example neurology) and a specific subject index (for example cerebral palsy), both of which give question number references. These indexes allow rapid identification of relevant questions when revising by topic or subject. The standard of the questions is comparable with that of the Royal College practice papers, other MCQ books aimed at part I candidates and recent part I exams. The explanations are clear, concise, and easily understood. They present the information required to answer the questions in short and readily understood and retaped paragraphs.

There are many multiple choice books currently on the market written for the part I MRCPaeds candidate and there is generally little to choose between them. However, the clear layout and quality of the explanations would make this book a valuable revision aid for the prospective part I candidate.

Andrew A M Morris
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Letters, Correction, Book reviews, Westminster briefing


The paediatric MRCP part I examination has created a new market for the burgeoning industry which has developed around medical postgraduate examinations. These two volumes are the latest offerings to the multiple choice question (MCQ) hungry candidate. Volume 1 is a comprehensive review of systems while volume 2 provides six complete examinations for further practice. The authors have wisely refrained from adding to the myriad of often conflicting MCQ tips available to the bewildered candidate and state their brief as the provision of practice material. The advice proffered on examination technique is standard and uncontroversial.

It is a remarkable feat to have conjured up quite so many obscure questions. However the answers are often short, with little or no explanation, and there is rather too much emphasis on eponyms and obscurities. One may question:

A. whether an earnest politician’s urine truly smells fishy (vol 1, p35)
B. the odour of a non-earnest (insincere?) politician’s urine
C. the wisdom of inserting jokes into an MCQ book and
D. which of the above is true.

Otherwise the questions are generally well organised and unambiguous, and comparable with those in the specimen paper available from the Royal College of Physicians.

Shamima Rahman
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Westminster briefing

The following items are from Children & Parliament, autumn 1997. Children & Parliament is an abstracting service based on Hansard and produced by the National Children’s Bureau. It covers all parliamentary business affecting children and is available on subscription via the internet. The Children & Parliament web site provides direct links to full text Hansard, government department sites, the sites of the Office for National Statistics, Ofsted, and other relevant organisations. For further details contact Lisa Payne, Editor, Children & Parliament, National Children’s Bureau, 8 Waldey Street, London EC1V 7QE (tel: +44 (0) 171 843 6000; fax: +44 (0) 278 9512). (The Hansard reference is given in parentheses.)

• The Medical Research Council annual spending on diabetes research is some £3 million and the Department of Health Policy Research Programme spent £272 000 on such research in 1996–97. (14 Oct 97, Col 399.)

• The third part of the Disability Discrimination Act 1995 is to be implemented as soon as is practicable. A government task force is to study issues related to securing disability rights and the setting up of a disability rights commission. (21 Oct 97, Col 605–608.)

• Extra money for schools announced in the budget will amount to £1 billion each year for education and a single sum of £1.3 billion for buildings and equipment to cover the current year and the next four years. The money will be spent on books, equipment, teacher training, measures related to discipline and truancy, class size reductions for 5 to 7 year olds, and building repairs. (15 Oct 97, Col 440–444.)

• Questioned about the right of a general practitioner to refuse to take on a lesbian patient, the Minister of State for Health referred to 1992 General Medical Council guidance condemning discrimination on grounds of age, sex, sexuality, race, colour, beliefs, perceived economic worth, or the likely work load for doctors because of the patient’s clinical condition. (21 Oct 97, Col 202.)

• All local authorities are expected to draw up a plan for preschool education to be implemented from April 1998. Places for all 4 year olds will be available by September 1998. Early education is to be integrated with day care. (16 Oct 97, Col 550–552.)

• The 1976 Adoption Act makes no special provision for adoption by lesbian/gay couples. A similar application may be made only by married couples. Unmarried couples may not apply jointly but one of the pair may do so as an individual. (3 Nov 97, Col 74–75.)

• In 1996–97 government grants for asylum seekers with children amounted to £4.1 million; for adults without children it was £5.6 million, and for children without adults £3 million. (13 Nov 97, Col 652–653, 173–174.)

• The government commissioned a review of safeguards against the abuse of children in care. The resulting Utting report presents “a woeful tale of failure at all levels to provide a secure and decent childhood for some of the most vulnerable children”. Over a third of children in residential care are not being educated. Young children, disabled children, and those with emotional and behavioural problems are most at risk of abuse. The report made 20 main recommendations to safeguard children. (19 Nov 97, Col 327–338, 585–596.)

• A bill due to have its second reading in February 1998 would require information about lead in pre-1960 paint to be provided
to people who buy paint stripping equipment and fluids. It would also provide for children under 3 living in older houses to be tested for potential lead poisoning.
(19 Nov 97, Col 343–345.)

● The Department for the Environment, Transport, and the Regions is funding research on the safety of children’s journeys to and from school.
(14 Nov 97, 18 Nov 97, Col 696–697, 137–138.)

● A Health Education Authority campaign is aimed at encouraging women of childbearing age to take more folate in order to reduce the risk of neural tube defects.
(26 Nov 97, Col 996–997.)

● In 1996–97 there were 1.7 million lone parents in Great Britain and in February 1997 some 1 020 000 lone parents were receiving income support.
(4 Dec 97, Col 328–329.)

● An April 1997 survey showed that 23% of children aged 0–13 in the back seat of a car were not wearing seat belts; in the front seat 6% were not. In 1988 the corresponding figures were 47% and 9%.
(10 Dec 97, Col 27–28, 29.)

● The government’s new Social Exclusion Unit is part of the Economic and Domestic Affairs Secretariat in the Cabinet Office and will, at first, concentrate on truancy and pupil exclusion, homelessness and rough sleepers, and sink housing estates. It is to be set up for two years in the first place.
(8 Dec 97, 9 Dec 97, Col 408–410, 20–22.)

● Some 21% of schoolchildren have special educational needs and 3% have statements of their needs.
(5 Dec 97, Col 580–637.)

● The government has promised £200 000 to the United Nations to help the UN special representative on children and armed conflict to start work.
(10 Dec 97, Col 1000.)
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