Lucina

Concern has been expressed that intensive gymnastic training in children might inhibit growth and maturation. A study in Melbourne, Australia (Journal of Pediatrics 2000;137:510–6) of 31 10 year old gymnasts and 50 controls showed the gymnasts to be shorter (−0.5 SD), because they had shorter legs, but their growth over 18 months of observation was the same as the controls. Perhaps children with short legs are more likely to take up gymnastics.

Abdominal inflammatory pseudotumours are rare and often mistaken for malignant tumours. In Los Angeles (Journal of Pediatric Surgery 2000;35:1635–7), a 6 year old girl was thought to have a pelvic sarcoma and was found to have a 9 cm × 5 cm mass. Both had biopsies showing inflammatory pseudotumour and responded to treatment with a non-steroidal anti-inflammatory drug.

In considering the effect of diarrhoea on the growth of children in developing countries it may be important to distinguish between diarrhoea with and without the passage of blood (dysentery or non-dysentery diarrhoea). In rural Bangladesh (International Journal of Epidemiology 2000;29:916–21) gain in height and weight in children under 5 years was significantly slower after bloody diarrhoea than after diarrhoea without blood.

A study in Mexico City (Pediatrics 2000;106:1028–30) has not shown cisapride to be dangerous. Electrocardiograms were recorded on 63 children (mean ± SD 29 months) taking cisapride for gastro-oesophageal reflux and 57 hospital controls (mean age 27 months). Prolonged QTc was found in five children in the cisapride group and six controls. In three children the QTc interval became normal after stopping cisapride. In young children (<4 months) the mean QTc was longer in the controls. Holter 24 hour recordings were performed on all children with prolonged QTc and were normal. [The paper concludes, “no significant reflux is hoarseness”.] Now there’s a thought. Lucina could understand people thinking that any significant reflux can be a proctalgia but no significant hoarseness; she’ll have to give more consideration to that . . . (she thinks they mean “harmless”.)

Neonatologists in Hungary, Estonia, Lithuania, and Italy are more likely to believe in preserving life at all costs than are those in the UK, the Netherlands, or Sweden (JAMA 2000;284:2451–9). The view that predicted quality of life is important in making neonatal “end-of-life decisions” is more commonly held by women neonatologists, those without children of their own, those who are Protestant or have no religion, and those who work in large neonatal intensive care units.

Limited dorsiflexion of the ankles may predispense to ankle injury in children. In Ottawa, Canada (J Bone Joint Surg [Br] 2000;82-B:1103–6) the mean extent of dorsiflexion of the uninjured ankle in 82 children with acute ankle injuries was 5.7° (knee extended) and 11.2° (knee flexed). In 85 control children, most of whom had upper limb injuries, mean ankle flexion was 12.8° and 21.5°. These authors suggest that children with limited ankle flexion should have stretching exercises.

Researchers in Sheffield (Journal of Advanced Nursing 2000;32:1152–7) wanted to know whether early hospital discharge affected the rate of breast feeding at 1 month, so they randomised mothers to short (6–48 hours) or long (>48 hours) postnatal hospital stay. In the event, mothers were reluctant to stay in hospital and there was no significant difference in length of stay between the two groups. Not surprisingly, the study showed no significant effect of length of hospital stay on breastfeeding rate at 1 month. It did, however, show the predictable effect of being in a trial, in that women in both groups were more likely than other mothers in Sheffield to be breastfeeding at 1 month.

On the other hand, in Slovenia (Journal of Advanced Nursing 2000;32:1158–67) written instructions on how to breast feed successfully and frequently visits from specially trained nurses significantly improved breastfeeding rates.

Taking folic acid antagonists early in pregnancy increases the risk of oral clefts, cardiovascular malformations, and urinary tract malformations (New England Journal of Medicine 2000;343:1008–14). (Neural tube defects were not included in this study.) The use of multivitamin supplements containing folic acid reduced the risk from dihydrofolate reductase inhibitors (such as sulphasalazine, trimetereine, or trimethoprim) but not from antiepileptic drugs (carbamazepine, phenobarbitone, phenytoin, or primidone) which antagonise folic acid by different mechanisms. This study suggests for the first time that these antiepileptic drugs may increase the risk of urinary tract malformations. (It has previously been suggested that carbamazepine may increase the risk of neural tube and cardiovascular defects.) The teratogenicity of antiepileptic drugs may involve mechanisms other than folic acid antagonism or depletion.

People with Down’s syndrome are not insensitive to pain but their reaction to it may be different from that of others. Researchers in a French dental unit (Lancet 2000;356:1882–7) tested 26 people with Down’s syndrome (nine aged between 4 and 17 years) and 75 controls. They found that the Down’s syndrome group were slower (though prompted) to express pain (after self application of an ice cube to wrist and temple) and less precise at localisation of a cold stimulus (cotton wool ball soaked with ethyl chloride spray and applied to hand, face, and mouth). Whether the slowness and imprecision are due to sensory or motor problems, or both, is uncertain but what is certain is that people with Down’s syndrome need proper pain control just like everybody else.

On an intensive care unit in Belgium (Critical Care Medicine 2000;28:3581–7) 20 adults with intractable septic shock were given short term (4 hours) high volume haemofiltration (STHVH) followed by at least 4 days of standard haemofiltration. Eleven patients showed cardiovascular improvements during STHVH and nine of those survived to 28 days whereas none of the nine non-responders survived.

Of 150 children with malignant disease admitted on 206 occasions to a paediatric intensive care unit (PICU) in Sydney, Australia (Critical Care Medicine 2000;28:3718–21) 40 died in the PICU but estimated overall long term survival was 50%. After a median follow up of 3.5 years 74 children were disease free, 68 of them without disability.

A study in 20 US cities (New England Journal of Medicine 2000;343:1742–9) has confirmed an association between air pollution with particulate matter less than 10 μm in diameter and overall, cardiovascular, and respiratory mortality. Ozone concentrations were possibly related to mortality, but only at the height of summer and there were no associations between levels of carbon monoxide, sulphur dioxide, or nitrogen dioxide and mortality.

The four main conclusions from a nine country European survey of parents and neonatologists about consent for neonatal trials (Lancet 2000;356:2045–51) were that parents value being asked for consent, researchers need more training in asking for it, parents rarely use written information (though it may be helpful to go through it with them), and they should be made aware that a research ethics committee has already approved the trial.