Does thyroid hormone excess have a direct toxic effect on the fetus? To study the effects of TH (thyroid hormone) excess on fetuses a retrospective study of 167 pregnant women was carried out. Affected mothers had an increased rate of miscarriage. The authors conclude that the lower birth weight and suppressed levels of TSH in unaffected infants born to these mothers indicates that the high maternal TH levels produce fetal thyrotoxicosis. These data indicate a direct toxic effect of TH excess on the fetus. JAMA 2004; 292: 695.

The varicella vaccine has been controversial, but now more data is appearing on its safety and efficacy. This latest study deals with the contagiousness of vaccinated varicella cases. Information on varicella cases in a community of approximately 320,000 during 1997 and 2001 was collected. A total of 6316 varicella cases were reported. Among contacts aged 1 to 14 years exposed to unvaccinated cases, the secondary attack rate was 71.5% if they were unvaccinated and 15.1% if they were vaccinated. The study concludes by stating that under conditions of intense exposure, varicella vaccine was highly effective in preventing moderate and severe disease and about 80% effective in preventing all disease. Breakthrough varicella cases in household settings were half as contagious as unvaccinated persons with varicella, although contagiousness varied with numbers of lesions. JAMA 2004; 292: 704.

Adolescent depression is a common mental health problem that is being increasingly recognized. This trial was conducted to find out the efficacy of Fluoxetine and cognitive behavioral therapy (CBT) in its treatment. From the spring of 2000 through the summer of 2003, the investigators enrolled 439 adolescents with a primary diagnosis of Major Depressive Disorder meeting DSM-IV criteria. Age range was 12 to 17 years, and 29% of patients had clinically significant suicidal ideation. The participants received 12 weeks of fluoxetine alone (10 to 40 mg/day), CBT alone, CBT with fluoxetine (10 to 40 mg/day), or placebo. Fluoxetine with CBT was more effective than Fluoxetine alone which was more effective that CBT alone for treatment of adolescent depression. Thus the current evidence suggests that the likelihood of a good outcome is enhanced by the combination of appropriate and carefully monitored drug treatment with an empirically validated psychotherapy. JAMA 2004; 292: 807.

Does bullying in school have negative psychosocial consequences in later life? An international study was conducted across 25 countries using cross-sectional self-report surveys. Involvement in bullying, as bully, victim, or both bully and victim, was assessed. Participants included all consenting students in sampled classrooms, for a total of 113,200 students at average ages of 11.5, 13.5, and 15.5 years. The results showed that involvement in bullying varied dramatically across countries, ranging from 9% to 54% of youth. However, across all countries, involvement in bullying was associated with poorer psychosocial adjustment (P <0.05). Victims consistently reported poorer relationships with classmates, whereas bullies reported greater alcohol use and weapon carrying. The researchers observe that bullying is a critical issue for the health of youth internationally. Arch Pediatr Adolesc Med 2004; 158: 730.
Because the therapeutic options for managing infections in neonates in developing countries are often limited, innovative approaches to preventing infections are needed. Topical therapy with skin barrier-enhancing products may be an effective strategy for improving neonatal outcomes, particularly among preterm, low birth weight infants whose skin barrier is temporarily but critically compromised as a result of immaturity. The authors tested the impact of topical application of sunflower seed oil 3 times daily to preterm infants <34 weeks gestational age. Treatment with sunflower seed oil (n = 51) resulted in a significant improvement in skin condition (P = 0.037) and a highly significant reduction in the incidence of nosocomial infections compared with infants not receiving topical prophylaxis (n = 52). A larger trial would be necessary to confirm what our grandmothers always used to say about massaging small babies with oil! Ped Infectious Dis J 2004; 23: 719.

Obesity is growing into an epidemic, and as pediatrician’s it is our responsibility to screen the children for the same. This study was done to predict the presence or absence of 3 age-adjusted risk factors (low high-density lipoprotein cholesterol level, high low-density lipoprotein cholesterol level, high triglyceride level, high glucose level, high insulin level, and high blood pressure) from age-adjusted BMI and waist circumference values. A total of 2597 black and white children and adolescents, 5 to 18 years of age, were examined. The study found that the use of BMI and waist circumference for the prediction of risk factor clustering among children and adolescents has significant clinical utility. Pediatrics 2004; 114: e198.

The interrelations between early enteral feeding, necrotising enterocolitis (NEC), and nosocomial sepsis (NS) remain unclear. The authors evaluated the effect of age at the introduction of enteral feeding on the incidence of NS and NEC in very low birthweight (VLBW<1500 g) infants. The study sample included 385 infants. Of these, 163 (42%) developed NS and 35 (9%) developed NEC. Enteral feeding was started at a significantly earlier mean (SD) age in infants who did not develop nosocomial sepsis (p = 0.0001). Multiple logistic regression analysis showed age at start of enteral feeding, respiratory distress syndrome, and birth weight to be the most significant predictors of risk of NS. The study emphasizes that early enteral feeding was associated with a reduced risk of NS but no change in the risk of NEC in VLBW infants. Arch Dis Child Fetal Neonatal Ed 2004; 89: F 293.

What are the parents’ perspectives about giving consent for neonatal research? This study investigated the recollections of parents consenting for their infants to be research subjects and determine their views about the need for consent. Parents of 154 sick newborn infants were enrolled in a randomized trial in the early neonatal period. All parents had given written consent and received printed information. A questionnaire and accompanying letter was sent to the parental home 18 months later. A significant proportion of parents who give written consent for a trial in the early neonatal period do not later remember having done so. Parents who have had experience of neonatal research would be unhappy for their baby to be enrolled in a study that had ethics committee approval without their consent being obtained. Arch Dis Child Fetal Neonatal Ed 2004; 89: F321.