

Research Roundup

By Jean Robinson

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- Walking in labour
- More thoughts on ultrasound
- Increase in birth defects
- Work and pregnancy

Walking in labour

The latest randomised study from Texas tells us a great deal about birth culture in Dallas. 1

Women arriving at the hospital in labour 3-5 centimetres dilated were asked to take part in a randomised study. Half would have "usual" care, which meant being confined to a bed where they would be "permitted" to assume their choice of supine, lateral or sitting position. The other half would be encouraged to walk, but were "instructed" to return to their beds when they needed intravenous or epidural analgesia, or when the second stage began. Walkers wore pedometers to record the number of steps they took. one- fifth of the women allocated to the walking group did not actually do so. For both groups positions "permitted" for delivery were lateral and dorsal-lithotomy positions, with or without stirrups.

Half of the women were having their first child. The outcomes were similar in both groups. There were no significant differences in length of labour, need for oxytocin, infection, analgesia, frequency of episiotomy, forceps or caesarean section.

Ninety-one per cent of both groups had spontaneous vaginal deliveries. Use of oxytocin to augment labour was similar in women having their first child - 35 and 36%. In multips it was 10% in walkers and 15% in the usual care group Forceps were 4% in walkers and 3% in usual care groups. Caesareans were 4% in walkers and 6% in usual care group.

When asked if they would choose to walk in another labour, 99% of the walkers said yes. There is no report on whether women allocated to bed were asked whether they would choose that option next time. There is no study of emotional outcomes.

The authors conclude "Since our results provide no objective evidence for or against walking during labor, it seems reasonable to let women elect either alternative".

AIMS Comment

Sometimes it is hard not to disturb your fellow library users when reading a particular study, but I managed to keep quiet till I could get to the photocopier and escape. With all that "permitting" and "instructing" going on in Dallas, I wondered where American feminism had got to - and this was in the prestigious New England Journal of Medicine. Even British obstetricians, for all their faults, no longer dare to use language like that, even if the inner beliefs of some are unchanged.

Please note, also, that the women were first informed of the study after they arrived in labour. This is contrary to our Charter which says women must be informed beforehand.

The problem with so many randomised trials in obstetrics is the narrowness and irrelevance of the questions they ask. Those practising "evidence based" obstetrics will now have "evidence" from a proper randomised trial that there is no apparent harm in women walking in labour if they want to. Increasingly we find women are being refused reasonable requests for choice (like waterbirth) because there is no specific evidence from a randomised trial of safety. Who is going to do a trial to see if the most favourable outcomes are simply related to letting women do whatever comes naturally at the time - labouring and delivering in whatever positions they happen to feel most comfortable, in water or out of it, eating or drinking, yelling or grunting, or swinging from the chandelier, in privacy or with companions of their choice?

But, for all our objections to the Dallas trial, their caesarean rates do not seem high - even their section rate for nullips (first time mothers) in the study - 7% for walkers and 8% for those labouring in bed. Of course women sifted out earlier for elective section would be excluded, and the study only covered those with cephalic presentation (head coming first) so we do not know what the overall rate was for the hospital. But UK statistics are getting worse. Look at the 27% sections reported for Epsom, plus 11.6 instrumental deliveries. 14.6% of births there were emergency, not elective sections, which is way higher than the rate at Dallas. The excellent statistics provided by South West Thames show we have nothing to crow about.

Reference

- 1. Bloom, S et al, Lack of effect of walking on labor and delivery, N Eng J Med, 1998; 339: 76-9.
- 2. <u>South Thames West Perinatal Audit Team, Understanding and Monitoring Perinatal Outcomes</u> 1993-6, CESDI 1998.

Return to top

More thoughts on ultrasound

A study from Norway looks at outcomes of antenatal ultrasound diagnosis in 36 children with serious congenital problems - The study was looking at how many of the problems were detected by ultrasound before birth, and whether outcomes were better when the problem was known before birth than for babies where the problem was missed on the ultrasound and not seen until after delivery.

Only 2 of 8 congenital diaphagmatic hernias were picked up on ultrasound, half the cases of abdominal wall defects (6 out of 12), 38% of the meningomyelocele (5 of 13) and none of the three cases of bladder extroversion.

All 13 babies with prenatal diagnosis were delivered by caesarean. Nineteen of the 23 with postnatal diagnosis had an uncomplicated vaginal delivery. Those with prenatal diagnosis had shorter gestational age (about two weeks), lower birthweights, and slightly lower Apgar scores. 3 out of 13 (23%) died compared with 1 out of 23 (4%) of those diagnosed after birth.

AIMS Comment

This admittedly small study did not show any advantage for the baby of being diagnosed before, rather than after, birth. The women had had an average of 5 scans, but the average was 7 in women who had a problem detected. Although small, this is an important study. Pregnant women often automatically assume that antenatal detection of serious problems in the baby means that lives will be saved or illness reduced. Knowing about the problem in advance did not benefit these babies; more of them died. They got delivered sooner, when they were smaller, and that could have long term effects. All 12 babies with abdominal wall defects survived, but for the 6 detected on the scan, their length of hospital stay was longer and they spent longer on ventilators, though the numbers are too small to be significant. They were operated on sooner (4 hours rather than 13 hours) but the outcomes were the same.

We must help women to realise that although more technology may provide more information for the obstetrician, that may not improve chances for the baby, and could add risks. There may also be risks from greater exposure to ultrasound as the machines become more powerful.

Reference

• Skari, H, et al, Consequences of prenatal ultrasound diagnosis: A preliminary report on neonates with congenital malformations, Acta Ob Gyn Scand, 1998; 77: 635-42.

Return to top

Increase in birth defects

The above report in ultrasound should be read in conjunction with another one. A recent study from South West England shows that abdominal wall defects are increasing. Cases of gastroschisis (where the

abdominal wall does not close) are increasing. In 1987 the incidence was 1.6 per 10,000 births. By 1995 it had risen to 4.4 per 10,000. It is more common in births to women under 20 (13.3 per 10,000) and much rarer in those aged 20 and older (1.1 per 10,000) 23 of the 71 pregnancies were conceived while mothers were on the Pill. More than expected were conceived in the first quarter of the year, which could be connected with a flu virus.

Studied from elsewhere have also found an increase, and research is urgently needed to identify causes.

AIMS comment

As we wrote in our original critique of ultrasound, it is the incidence of congenital defects and their primary prevention which matters most to mothers, whereas obstetricians have concentrated on the "triumph" of antenatal detection. Where serious abnormalities are rising, the causes must be sought urgently. Although most of the children are saved by surgery nowadays, this represents suffering to them, anxiety to families, and higher costs to the NHS.

Reference

• <u>Penman, D, et al, Increase</u> in incidence of gastroschisis in the South West of England in 1995, Br J Ob Gyn, 1998; 105: 328-31

Return to top

Work and pregnancy

A study of over 5,000 women in Norway asked about the jobs they did during pregnancy, and looked at risks of low birth weight. Multiple births were excluded. Women were asked about lifting, twisting, and bending, and work where they could not adjust the pace themselves.

Daily exposure to strenuous work was a risk factor for low birth weight for women expecting their first child, especially non-smokers. Lifting heavy loads, lack of influence on the pace of work, and twisting and bending were all risk factors. This does not mean that smokers are not also affected, but it is more difficult to judge effects in them.

The authors suggest that assessing the job the mother does in early pregnancy, and modifying it, may bring benefits as great as giving up smoking.

AIMS Comment

Please note this study only covers surviving babies and does not include those which were lost through miscarriage. This is one of many studies or pregnancy and occupation. Others have found adverse effects of lifting, or standing. Whilst there is great emphasis nowadays on women being employed, too little emphasis is placed on the adverse effects of the work some have to do.

Reference

• Work and pregnancyWergeland, E, et al, Strenuous working conditions and birthweight, Norway 1989, Acta Ob Gyn Scand, 1998; 77: 263-71

Return to top