Both maternal and perinatal mortality in South Africa are far too high for a country as wealthy as ours. The confidential enquiries into maternal deaths reported in the Saving Mothers Reports, and the perinatal care surveys reported in the Saving Babies Reports, clearly identified where the challenges lie in preventing deaths of mothers and babies. However, death is only the tip of the iceberg. What is happening in routine management of labour in public institutions throughout the country?

According to the new curriculum of the Faculty of Health Sciences at the University of Pretoria medical students are obliged to go to university-approved public institutions outside of the academic centres for their community obstetric rotation, which includes conducting births. This rotation is coupled with community-based education and is regarded as an essential part of the training as the student is exposed to medical practice outside of academic hospitals. During this exercise students are required to keep a logbook and portfolio in which they record at least 15 cases, in each instance analysing what they have learnt. The logbooks and portfolio are handed in for evaluation at the end of the rotation. The students are then required to defend their portfolios during an oral examination conducted by one of the authors. Over the past 24 months the authors have evaluated more than 5,000 cases recorded by students from 17 non-academic hospitals. The authors recorded misconceptions, harmful practices and potential malpractice reported by the students in preparation for a feedback meeting with them. Problems recorded by more than one student were discussed at the meeting to save the authors from having to repeat themselves repeatedly during each student’s defence of his/her portfolio. The authors analysed the lists of misconceptions and harmful practice and report here on only those items recorded in more than three reportback meetings, the assumption being this would identify widespread harmful practice rather than isolated incidents. These data form the background for this comment. The students are all in their internship year and completed a basic course in obstetrics in their third year. Their knowledge of the subject is not extensive and there is no reason to believe that the students would make up or be able to make up the case histories of the patients. Some students found certain problems to be so common that they were recorded as general comments at the front of their reports. Students have to complete partograms for each of their patients, so the use of the partogram by the institution could not be evaluated.

The harmful practices recorded are listed below in order of danger to patients.

1. Augmentation of labour using vaginal prostaglandin tablets. The use of five tablets of misoprostol was also recorded for this purpose. Vaginal prostaglandin tablets are indicated for ripening the uterine cervix before induction of labour but they are extremely dangerous when used in patients who are in active labour and already having uterine contractions. The risk of uterine rupture is a real concern in this scenario.

2. Delay in doctor attendance. It seems that the reasons for this problem vary between institutions. At some centres midwives are reluctant to call doctors because they think they know what is best, at other centres they do not call because doctors object to being summoned ‘unnecessarily’. In some instances the doctor is called in time but does not attend to the patient until hours later, even in cases of dire emergency. The result is unfortunately almost always the same, namely poor outcome for mother and/or fetus.

3. Intravenous Buscopan given for poor progress in labour, often without a prescription. Buscopan is a muscle relaxant; its use is specifically contraindicated in pregnancy and we are aware of no clinical trials proving its safety or efficacy in pregnancy. Despite this fact there is a belief among some midwives that this drug can alleviate the uterine ‘spasm’ that causes prolonged labour, and therefore the drug is given to women with poor progress of labour, often without prescription and without recording it on the patient’s prescription chart.

4. Physical abuse of patients by midwives. This is extremely widespread and while most of our students are appropriately upset on witnessing this, it does not make it easier for the patients. Students have reported midwives calling abuse ‘verbal pitocin’, aimed at making patients behave and perform better in labour.

5. Performance of episiotomy without local anaesthetic, and lack of pain relief during labour. These practices tend to go together, and are based on a belief among some midwives that labour should be a painful process and that the patient is only ‘getting what she deserves’. The inhumanity of these practices needs no further discussion.

6. Fundal pressure in the second stage of labour. The dangers of fundal pressure are widely known, but what is also evident is that this is routine practice in most instances, often
going hand in hand with verbal and other abuse from the midwives. It is then sold to the students as the ‘ideal way to manage non-co-operative patients in the second stage of labour’.

7. Patients left unattended for extended periods of time, and single attendants during delivery. Although lack of staff does play a role here, patients are unfortunately sometimes left alone at a critical stage. Staff tea or lunch breaks should be postponed temporarily until the problem is resolved.

8. The use of 50% dextrose water intravenously for neonatal and maternal resuscitation. The use of dextrose water in labour is extremely dangerous, since high maternal glucose leads directly to high fetal glucose (via active placental transport) and therefore reactive hyperinsulinaemia in the fetus. This can lead to severe neonatal hypoglycaemia when the baby is suddenly deprived of the maternal glucose supply after delivery. Fetuses with a high blood glucose content are also much more prone to intratuitrine acidemia during periods of stress, via anaerobic metabolic pathways.

9. No estimation of the haemoglobin level during labour. Haemoglobin level is rarely estimated in labour, even in the case of clinically anaemic patients. The risk to an anaemic patient of severe intra- or postpartum bleeding is obvious.

10. Routine rectal enemas on admission. Despite the fact that no benefit has ever been proven from giving patients enemas in labour, it is common practice and can be very dangerous.

11. Lack of nutrition during labour. Patients are starved on the basis that they might need an urgent caesarean section. It has been clearly shown that this practice is unnecessary and may be harmful. Students have reported that food is nevertheless ordered for patients in labour, and then consumed by the nursing staff.

12. Lack of privacy. This is contrary to the ‘Patient’s Charter’. On occasion it is unavoidable owing to the physical structure of the labour ward, but on other occasions there are ways to ensure privacy.

13. Passive management of the third stage of labour. This increases the risk of postpartum haemorrhage significantly. Postpartum haemorrhage is one of the leading causes of maternal death and is the most preventable. The national guidelines recommend active management of the third stage of labour.

14. No HIV testing or counselling. This is despite the recent court order instructing implementation of the Prevention of Mother to Child Transmission Programme using nevirapine. Many of these harmful practices are not new and have been reported before, notably by Fonn et al. and Jewkes et al. Feedback has been given informally to the relevant hospitals. However, the practices continue unabated.

This calls into question the current emphasis on training medical students at non-academic institutions where considerable harmful practice occurs. If it is so widespread in this small subset of medical practice, one has to wonder what is happening in other disciplines. Clearly medical students are learning bad habits from non-academic hospitals. The message we are giving our students is: ‘Do as we say, not as we do’.

What sort of example are we setting? Clearly we are perpetuating harmful practice by the very method we are using to teach our students. This should not be allowed to continue.

There are a number of potential solutions, requiring the allocation of varying levels of resources. The first solution is the most inexpensive, namely to withdraw students from these harmful environments and bring them back to academic institutions. However, this will defeat the object of exposing students to different environments, preparing them to function as independent practitioners in these contexts.

Another solution is outreach to all the new teaching sites to ensure that these harmful practices are eradicated. This is probably the ideal solution, but will require enormous resources to implement. To be successful the outreach agent will have to be authoritative so that changes will be implemented. Senior medical posts would have to be created specifically for this purpose. These posts would have to be joint appointments between the university and the province.

Between these two extremes lies a spectrum of less ideal alternatives, some of which are receiving attention, such as quality assurance programmes, licensing of hospitals and compulsory continuing professional development for nurses.

For the moment, there should be no training at non-academic sites without some form of report-back from the students and an extensive debriefing of the students on their return to dissuade them from harmful practices. With regard to labour ward practice, every institution conducting births should be strongly encouraged to institute the Better Births Initiative, a programme specifically designed to introduce best practice to the country’s labour wards. We feel this should become a national programme and resources should be put into it by the National Department of Health to ensure its success.

E Farrell
R C Pattinson

Department of Obstetrics and Gynaecology
Kalafong Hospital and University of Pretoria