	Had agreed to necropsy (n=19)	Had refused necropsy (n=10)
Satisfied with arrangements for handling the baby	18/19	9/10
Found meeting with the doctor seeking consent helpful	14/16	2/4
Counselled about usefulness of necropsy	9/16	3/7
Counselled about necropsy procedure	8/16	1/7
Advised about possibility of limited necropsy		0/8
Advised of availability of report in plain language	16/18	
Satisfied with presentation of necropsy findings	8/16	
Regretted decision to agree or refuse necropsy	1/18	3/10

The number of women who claimed that they had not been informed of what the necropsy entailed or of its usefulness is alarming since it suggests that decisions to consent to or refuse a request for a necropsy are not made after informed counselling. For example, one woman who had agreed to a necropsy assumed that the procedure was only "tissue sampling" and thought that the questionnaire was not applicable to her. There was an apparent lack of knowledge of a limited necropsy; possibly clinicians and patients had had reasonably acceptable diagnoses for the perinatal loss and considered further attempts at explaining the procedure or the possibility of a limited necropsy unnecessary. Alternatively, parents may fail to comprehend what has been said because of fear, anxiety, or grief.² In this respect, a leaflet in plain language explaining the advantages and disadvantages of a necropsy and what it entails may allow grieving parents to make an informed decision regarding consent.

Some of the women were dissatisfied with the findings of the necropsy or with the delay to receipt of the results. Review of the case notes for those women who were dissatisfied with the findings indicated that the necropsy did not add further to the clinical findings. The dissatisfaction is regrettable as clinical findings need to be confirmed by a properly performed necropsy, and a necropsy with no positive findings is valuable.³ Delay may be necessary so that all laboratory results can be included, but this delay may prove unsatisfactory for some parents unless it is explained when consent to necropsy is sought.

Greater emphasis should be placed on better communication,⁴ whether in obtaining consent or in relaying the findings, and in involving clinicians and pathologists at such sensitive times.⁵

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Oral submucous fibrosis

EDITOR,—H I Atrah's editorial on fibrin glue¹ helps to consolidate the theory of hypercoagulation and local coagulopathy in the oral cavity in oral submucous fibrosis. Oral submucous fibrosis is a chronic disease of unknown aetiology reported

mainly in Indians. As well as occurring in India it has been seen in Indians living in South Africa, Malaysia, Kenya, Uganda, Fiji, and Britain. For instance, in Leicester, England, which has a large number of Indian immigrants, the expected number of patients with the disease is 3000.²

After working for about 15 years on oral submucous fibrosis colleagues and I have shown that the saliva of patients with the disease contains a thrombin-like substance, identified as fibrin production factor. In contrast, fibrinolytic substances have been shown in normal saliva. Other centres in India have confirmed the presence of fibrin production factor in the disease (personal communication).³

I have shown that when citrated plasma, either from a patient with oral submucous fibrosis or from a normal person, is mixed with saliva from a patient with oral submucous fibrosis it forms a clot. The best clot formation takes place after about two to 12 hours. I believe that fibrin production factor in saliva interacts with plasma or fibrinogen in the submucous area of the oral cavity and produces dense fibrosis—there is a continuous "fibrin glue" process in the oral submucosa.

In addition to the local coagulopathy produced by fibrin glue mechanisms, defective fibrinolysis⁴ and a picture similar to that seen in well compensated disseminated intravascular coagulation seem to occur in oral submucous fibrosis.⁵ Such defective or delayed fibrinolysis could be due to a genetic predisposition or secretion of a substance like aprotinin, which delays the fibrinolytic action of plasmin. The production of such a substance in saliva in oral submucous fibrosis needs further study. Perhaps some antithrombin agent or anti-protinin substance could help stop the progression of the disease.

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Parents in the recovery room

EDITOR,—P A Hall and colleagues are in favour of parents being in the recovery room as their child recovers "whenever possible."¹ Some responses to their questionnaire, however, do not seem to support this view. On the postoperative parental questionnaire 23 of 132 parents said that they felt anxious, and the authors themselves quote Bevan *et al*, who showed that parental anxiety is associated with more behavioural disturbances in children.²

Perhaps of greater concern is the fact that roughly one in five nurses felt distracted, commenting that it seemed as though they were looking after "two patients"—that is, parent and child. During the immediate postoperative recovery period, potentially life threatening complications requiring prompt and skilled treatment by the recovery room staff may arise. The workload in the recovery room is unpredictable, with periods when all the bays are occupied being interspersed with periods when only one or even no patients are present. It is almost impossible to be sure that sufficient staff are available to care for parents at all times, and nurses should not be distracted from caring for the patients, as was the case in this study. Patients' privacy must also be respected, and it is difficult to see how this can be

achieved with present arrangements in British hospitals.

There seem to be sound benefits to the child when his or her parents are in the anaesthetic room,³ although these have not been proved. Parents may also value being in the recovery room,⁴ but the priority must be the child's welfare. Further investigation should be undertaken to evaluate any benefits to the patient against clinical risks before allowing parents into the recovery room becomes normal practice.

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Keyhole surgery

EDITOR,—In his review of a television programme on keyhole surgery Stephen Nixon makes some surprising comments regarding hernia repair.¹ I was the "hernia surgeon, giving the impression of never having seen a laparoscopic repair," who demonstrated the simplicity of the "open mesh technique for hernia repair. It was performed under conscious sedation and local anaesthesia, and the patient later expressed that "it was easier than going to the dentist." This low cost procedure with minimal risk gives excellent results,² is performed as a day case procedure, and results in little postoperative discomfort, and most patients are fully active within a week. It matches the advantages, without having the disadvantages, of the more invasive keyhole method requiring general anaesthesia.

Nixon admits the risk of organ injury with the laparoscopic approach ("still less than one in 200 cases") but does not mention that such injury is virtually unknown in many thousands of open operations reported.^{3,4} He writes of a recurrence rate of 10% with "conventional repair," but with modern open procedures the recurrence rate is less than 2%.^{3,4} He mentions the "considerable mortality" of the open repair, but this occurs only in emergency situations such as strangulation and in elective operations mortality should be zero.^{2,3}

I agree that no mention was made of randomised trials, but there were time constraints. I would have liked to state that, because of the low recurrence rate associated with the open mesh repair, a randomised trial would probably require vast numbers of patients to show any significant differences. When data are already available from many sources, with reports of failure of the laparoscopic technique ("conversions"), an unacceptable rate of early recurrence, major complications, and even deaths, can it be justified to randomise and expose so many patients to the technique? Judging from the viewers' response to the programme, many people would not wish to be randomised when they realise that a groin hernia may be easily repaired under sedation and local anaesthesia.

Rather than wasting time and resources on the keyhole method, more surgeons should be trained in tensionless mesh repair under local anaesthesia. This is easily taught and has achieved results unlikely to be surpassed by the keyhole method.

So far the only justification for the laparoscopic method is a possible marginal lessening of post-operative discomfort, but is this so important when one considers the complexity and risks of the procedure compared with those of the mesh technique?

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Sedation in fibreoptic bronchoscopy

Further study is needed

EDITOR,—We agree with M Q F Hatton and colleagues that it is unnecessary to sedate a patient for a procedure for which local anaesthesia may be used satisfactorily.¹ Sedation is safe provided that the administrator has had specific training and that guidelines for the selection of patients, monitoring, resuscitation facilities, and use of supplemental oxygen are followed. The drugs and techniques used should carry a wide margin of safety.² Hatton and colleagues state that sedation for bronchoscopy is associated with major complications.^{3,4} We note that many of these complications were attributed to inadequate resuscitation equipment, the failure to give supplemental oxygen, or the use of opiates with benzodiazepines (a synergistic combination with a narrow safety margin).² Patients' comfort and their tolerance of bronchoscopy may be influenced by several factors, including the depth and quality of sedation and the effectiveness of airway anaesthesia.

Active agent or placebo was used to produce light sedation. Did the authors use a recognised objective assessment of sedation—for example, the Ramsay score⁵—to titrate the level of sedation? The failure of doctors to identify whether active treatment had been given (18% for phenoperidine and 47% for midazolam) suggests that many patients were not sedated. It is not surprising that subtherapeutic doses failed to make the procedure more tolerable.

We note that patients who received phenoperidine said that they would be disinclined to repeat the procedure. We agree that the high incidence of nausea, vomiting, and dysphoria and the lack of hypnosis associated with synthetic opiates might produce poor quality sedation and contribute to this disinclination. Did the authors record the amount of topical local anaesthetic given, and was a similar quantity used for all groups?

We suggest that a further study with an objective assessment of sedation and control of compounding variables, such as the amount of local anaesthesia, is required to answer whether sedation helps in fibreoptic bronchoscopy.

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Doses that produce amnesia should be given

EDITOR,—I have considerable reservations about M Q F Hatton and colleagues' conclusion that routine sedation has little part to play in patients undergoing a single diagnostic bronchoscopy.¹ The description of the patients' willingness to undergo a repeat procedure, as indicated on a visual analogue scale, makes it difficult to compare their results with others but presumably means that a substantial number of patients would not be happy to have the test repeated. I have been impressed by the number of patients who, when discussing a bronchoscopy, have said something to the effect of "I do not mind what you do to me as long as you put me to sleep." Certainly, previous studies have shown that up to a quarter of patients would not be prepared to have a repeat bronchoscopy.^{2,3}

My colleagues and I have recently published our results of using higher doses of midazolam (mean 0.24 mg/kg).⁴ This dose produces complete amnesia, and only one of 123 patients was not prepared to have the procedure repeated. Although there are concerns about complications associated with sedation, we have been using this technique for several years without serious problems. This is probably because we give the midazolam in small incremental doses over several minutes. If any problems arise the sedation can be rapidly reversed with intravenous flumazenil. Surely, if many un-sedated patients find the procedure so unpleasant that they are not prepared to have it repeated then sedation in doses that produce amnesia should be used.

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Intravenous sedation is inappropriate in most minor procedures

EDITOR,—M Q F Hatton and colleagues' suggestion that intravenous sedation has little part to play in fibreoptic bronchoscopy has far reaching implications in all the surgical specialties.¹ I believe that intravenous sedation has little if any role in most minor procedures.

Many such procedures are carried out under sedation by junior medical staff, who often draw on their experience in casualty departments. The aim of using sedation under these circumstances is to make the procedure more comfortable for the patient. I have often, however, seen escalating doses of hypnotics being given without effect when analgesia would have been more appropriate. What makes such procedures unpleasant is not awareness but pain. There is a widespread, fundamental failure to distinguish between analgesia and sedation.

I believe that the root of this evil rests in casualty departments, where many doctors start their surgical training. There, many procedures—for example, manipulation of Colles' fractures—are

routinely carried out under intravenous sedation. Many casualty departments have policies forbidding senior house officers to use intravenous regional anaesthesia (Bier blocks) because of potential complications. Instead they encourage the use of intravenous sedation. I have never found sedation to be of any value in facilitating the manipulation of such fractures unless doses sufficient to induce general anaesthesia are used. This is because the patient wakes up as soon as pain is elicited by movement at the fracture site. All too often doctors accept patients' short lived pain and distress, hiding behind the theoretical side effect of amnesia. Even more surprising is that they are encouraged to do so by the nursing staff.

The relief of pain and suffering is the basis of our work. Surgical trainees and, indeed, all doctors and nurses should be encouraged to learn effective methods of analgesia through their reading, consultation with anaesthetic staff, and supervision by senior colleagues. Let us eradicate this barbaric practice of inappropriate intravenous sedation and banish midazolam from the cabinet.

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Patients must be monitored

EDITOR,—M Q F Hatton and colleagues suggest that the routine use of intravenous sedation has little part to play when patients undergo a single diagnostic procedure.¹ We agree that the blanket administration of intravenous sedatives to all patients undergoing endoscopic procedures is inappropriate, but we believe that these drugs have a useful role in helping a small number of patients to accept an often distressing procedure. In this context it is important to emphasise monitoring and the correct dose of drugs to ensure the safety of patients. In view of guidelines on sedation by non-anaesthetists issued by a working party of the Royal College of Surgeons we are concerned that the authors fail to mention if, or how, patients were monitored during the procedure.²

In simple sedation, reassurance and hypnotic suggestion, together with the use of drugs, produce a state of depression of the central nervous system during which communication is maintained so that patients respond to instruction. If this is lost then the patient has, for all intents and purposes, received a general anaesthetic with all its attendant risks. The authors do not define the term "light sedation." We find this misleading, as by implication a state of deep sedation must exist. What features delineate clearly the transition between the two? Does not deep sedation simply constitute a state of general anaesthesia as defined above? Although we are told that the dose of drug was titrated to achieve light sedation, most patients received the same total dose. In view of the varying susceptibility of patients to intravenous sedatives, it would be surprising if all patients achieved the same degree of light sedation.

Increasing numbers of patients are undergoing endoscopic procedures as day cases and as a result are exposed to the hazards of intravenous sedation. We applaud the authors for questioning and discouraging the routine use of intravenous sedatives in such procedures but would emphasise that, when they are used, the guidelines suggested by the Royal College of Surgeons should be followed.

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