hospital and that parturition will always carry some degree of risk wherever it occurs.

C K HUDSON

Tadley, Hants

[1] Hudson, C K, *Practitioner*, 1968, **201**, 816.

SIR,—Your leading article (10 January, p 55) outlines the present feelings and facts concerning home and hospital confinement but does not differentiate between confinement in the relatively large consultant obstetric unit and the relatively small general practitioner unit.

The GP unit can offer a more homely environment with continuity of care by the GP obstetrician (who will be present at the birth and has often been known by the mother for a long while) and by midwives she knows. There is evidence that this may produce a bonus of easier and less complicated delivery which needs critical analysis and may be very important. Good results can be obtained, as shown by our published experience at Sherborne[1] and by other reports.

Midwifery remains the art of the unexpected despite attempted selection, as recognised by obstetricians and illustrated by the finding of Dr C A Cox and his colleagues (p 84) "half the babies with problems at birth occurred in the obstetric low risk group." Interested and suitably qualified GPs working in GP obstetric units with essential operation and anaesthetic facilities, with consultant backing, could have a vital and increasing part to play in obstetric care and confinement, combining good obstetrics with the benefit of a homely environment and continuity of care. This concept of care has interested the Conference of Local Medical Committees and is considered to warrant full investigation—no doubt in co-ordination with the Royal College of Obstetricians and Gynaecologists.

The pending decrease in the number of foreign-trained doctors who fill such a high proportion of junior hospital appointments may well necessitate a change in the pattern of obstetric care.

JOHN HEARD

Yeatman Hospital,
Sherborne, Dorset

[1] Heard, J H, *Practitioner*, 1972, **209**, 212.

Dyslexia

SIR,—Your leading article (27 December, p 724) on dyslexia was welcome Yuletide reading, for it represented a praiseworthy change from the many prejudiced and carping attitudes launched mainly by non-medical sceptics. Nevertheless, it does not go far enough. When in 1968 the World Federation of Neurology formulated its definition of developmental dyslexia it was the unanimous product of a highly experienced, international and multidisciplinary research group. Since that time I have not met with criticism of that definition from any informed neurologist. True, one or two members of the laity have confessed that they did not know the meaning of the technical term "cognitive." That is understandable.

The concept of "developmental dyslexia" does not materially differ from what the Tizard and Bullock committees subsequently referred to as "specific reading retardation," so why do neurologists choose to speak of developmental dyslexia rather than specific reading retardation? Dyslexia is not only a crisper and grammatically more flexible term but it indicates that we are dealing with a syndrome which is something more than an isolated defect in reading. It subsumes delay in learning to tell the time; muddled serial thinking which transcends the letters of the alphabet; and gross inaccuracy in spelling. These problems are followed at a later age by a relatively restricted vocabulary; great difficulty in fluent expression of ideas on paper with acceptable standards of syntax and punctuation; and often a life-long reluctance—rather than an incapacity—to read. The concept of developmental dyslexia also embraces notions of predyslexia and of dyslexia variants, chief among which lies "specific spelling disability."

Even the critics of dyslexia now admit that the condition is not environmental but constitutional, being commoner in boys and familial in incidence; also that it occurs in children of all levels of intelligence, although it is more striking in those of above-average IQ. The multifactorial influences which you stress are unlikely to be integral but only deleterious epiphenomena, in my opinion.

You plead for poor readers to be assessed by an educational psychologist, a doctor, and probably a social worker. I would prefer to enlist my team as made up first and foremost by the family doctor, for the diagnosis is essentially a medical responsibility. He will require co-operation from the teacher—usually the first to spot that something is wrong. The doctor may perhaps elect to call in an academic or clinical psychologist to be assured that no fundamental defect of intelligence exists; in the same way ophthalmological and otological opinions may be sought in order to be confident that all is well in these perceptual spheres.

Beyond knowing where to go for the extensive remedial help which is so valuable and yet so specialised, the doctor's province does not encroach into that of the teacher. The doctor who is conversant with dyslexics in his practice, or even in his family, knows all too well how the youngster who cannot read benefits from a firm diagnostic label of developmental dyslexia, which liberates him from the stigmata of vague and pejorative dockets such as stupidity, laziness, neuroticism, as well as the suspicions of brain damage and minimal cerebral dysfunction. The child's morale is at once uplifted and for the first time hope for the future is engendered.

These facts explain why so many doctors approve the co-operation of parents, teachers, and others of good will who support such worthy organisations as dyslexia centres and dyslexia associations throughout the country.

MACDONALD CRITCHLEY
President Emeritus,
World Federation of Neurology

The National Hospital,
Queen Square,
London WC1

Isolation of patients with bone marrow depression

SIR,—The letter from Oxford (3 January, p 40) on protective isolation makes some important points with which we at this hospital essentially agree; we, too, believe that patients should not be incarcerated in plastic tents for long periods. In the first place we and others with long experience[1] have found that plastic tents are much less convenient than cubicles for isolation. Secondly, we agree that the patient with bone marrow depression should spend as much time as possible at home, although the need for platelet replacement and a variety of domestic problems often make hospital care essential. Very few patients with acute myeloid leukaemia (AML), however, need spend as long as "three to four months" in hospital; the mean period in two studies here since 1972 has been 5·9 and 5·4 weeks respectively.

However, in distinction to the Oxford view, it seems to us that the question to be answered is not simply that of protective isolation *or not*, but of what particular measures are both valuable and practical. Some measures such as washing hands before attending to patients are obvious; others such as air filtration and sterilisation of various possible sources of infection—for example, bed-linen, the daily newspaper, and the patients' own skin—are questionable. In essence the problems are the same as those of the operating theatre, where there are many practices of doubtful or marginal benefit. Such practices persist because they are logical, easy to perform, and provide the basis of an easily understood, disciplined routine.

The policy in the leukaemia unit at this hospital is one of "pragmatic protection"—that is, only those measures which by trial or inference are beneficial and can be employed without great cost (15-20% higher than in other wards) and inconvenience. The most important are restricted access to neutropenic patients (but visitors are separated only by a large, plastic, sound-transmitting window), meticulous attention to hand-washing, food of low bacterial burden, cleaning equipment which is sterile and not shared between cubicles, and a daily change of clean clothing for the staff.

With this basic discipline it is possible to evaluate new regimens of anti-leukaemia therapy unprejudiced by variable rates of infection and one can answer selected questions about certain anti-infective measures; thus in the past three years we have participated in a randomised trial of a single important variable—namely, the prophylactic use of non-absorbable alimentary antibiotics—and the number of otherwise similar patients observed (82 in this unit) has been enough to reach a reasonably certain conclusion. (Yes, in these circumstances the antibiotics are valuable[2].)

At the same time it has been possible to study in an unrandomised way the general performance of myelosuppressed patients (mostly AML) and to determine the incidence of infections, etc. The important conclusion here has been the regularly low incidence of exogenous infections during treatment, which has been associated with a very consistent rate of remission in AML: 1971-72, 16/32; 1972-73, 16/32; 1973-75, 30/49; overall, 62/113 (55%).

In so far as regimens similar or identical to that used in 1971-72 have also been used at other centres[3-5] comparisons are possible, but, while the remission rates at this hospital may have been somewhat better in that they have not been impaired by periods when many fatal infections occurred early in treatment, we are aware that other factors than protective isolation are operative. Thus the ratio of staff to patients, the continuity of an experienced team of nurses and doctors, and the availability of supportive transfusion may have been at least equally important.

What our data suggest and what has been shown by randomised trials elsewhere[6 7] is that protective isolation does decrease the incidence of serious infections and fatalities