As a result, between 1 October 1968 and 31 December 1971, 2,948 women aged between 20 and 39 (out of a possible 5,121, based on 1966 census figures) and 2,520 women aged between 40 and 59 (out of a possible 7,351, based on 1966 census figures) were screened by the Ayre's technique by their doctors or at stay-well clinics. No invasive epidermoid carcinoma of the cervix was found among the younger age group but 12 of them were found to have intraepithelial cervical carcinoma. The corresponding figures for the older age group were 11 and 12. Thus the harvest of cancer was greater among the younger age group than from the larger, younger group.

We wished to discover how screening of women aged between 20 and 70 and the treatment of any cervical cancers found would affect the mortality among our small but fairly static population. A survey of cancer registrations during 1949-68 showed that in that 20-year period there were 108 cases of epidermoid carcinoma of the cervix and that in 56 the patient had died. By comparing the number of cases found with the number of patients killed by their cancer in each quinquennial age group it was shown that there is a greater chance of reducing mortality from cancer of the cervix if the older group of women is examined rather than the younger.

Because of these findings we shall aim our next papers, in persuasion particularly at women aged between 40 and 60, but so unresponsive are the majority of women that the expansion of the campaign to the younger women was far-seeing. What needs to be done is to change the attitude of women to the test. We have found the younger women more ready to come for a smear test than their elders, and the opportunity offered by a final postnatal examination to suggest a smear test should be taken.

Women attending our stay-well clinics are warned to report unusual vaginal bleeding. A woman who had a negative smear in February 1971 reported postmenopausal bleeding in November. The Ayre's test was then positive. She had an endocervical cancer, and the gynaecologist remarked that in undiagnosed cases of biopsy hazards she would go through a "crust" of normal tissue. In another case a smear test was negative but curettage of the canal showed epidermoid carcinoma of the cervix (and adenocarcinoma of the body of the uterus) are sufficiently common to make the warning about unusual bleeding imperative.—I am, etc.,

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1 Davies, S. W., and Kelly, R. M., British Medical Journal, 1961, 2, 529.

Ileocolitis after Exchange Transfusions

Sir,—In Liverpool in the last year we have been concerned about a number of cases of ileocolitis after exchange transfusions in newborn infants. We have now found a hazard which may or may not be relevant to this problem. In my maternity unit I use the Grant heating chamber, which was passed by the Department of Health as a safe apparatus. The machine incorporates two thermostats so that if the heat of the water rises to 37°C a red warning light appears and a second thermostat takes over so that the heat does not rise higher than 39°C. This would seem to be "fool proof" as long as the lamp in the red light is working.

I have found, however, that my nursing staff had been using the chamber with hot water from either an electric kettle or the tap. The wiring is such that in these circumstances the warning red light does not go on. Some of these heating chambers have been used for over 10 years, and this is not present in my model. The maternity unit in Liverpool other than my own that has had cases of ileocolitis uses the Bristol warm machine. When boiling water was poured into it by me the red warning light did not go on.

There are obviously many hazards that can result from over-heating the donor blood—haemolysis of cells, possibly release of nitrogen gas which, if present in small bubbles, could be missed by the operator, quite apart from the possibility of release of toxic substances from tubing heated to a rather high temperature. Professor P. P. Rickham and I will be publishing a short paper in due course on our cases of ileocolitis.

The above hazard is, I think, of such importance that I felt there should be no delay in directing the attention of paediatricians to the risk. I have spoken to the makers of the Grant warming machine and they will be able to rewrite the apparatus to exclude this possible complication. In the meantime a large notice has been put on my machine stating that only cold water must be used.—I am, etc.,

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Care of the Mentally Handicapped

Sir,—I am surprised that there has been so little reaction to the letters from Mrs. Jean R., Mrs. McInroy, R. Davies, and Mrs. R. D. Paternoster, Miss Davies (30 October, p. 301). The importance of the letters lies in the fact that they question all the false assumptions that underlie the present planning of services for the mentally handicapped by the Department of Health and Social Security, recently published as a White Paper entitled Better Services for the Mentally Handicapped (3 July, p. 4). Both correspondents make a strong point of fundamental importance requiring further consideration. They are as follows:

"Better Care for at Home"

"The parents of subnormal children have been indoctrinated with the idea that they are better cared for at home," simply because any improvement in hospital conditions would cost a considerable amount of money. The author of the Scandinavian services who are so critical of the present care that hospitals give to the handicapped in this country omit to mention that the money they are spending money into their services for the handicapped, and yet according to Dr. D. C. Jones (13 November, p. 429) they still have not succeeded in solving all the problems of providing an adequately satisfactory service. At the same time the hospitals are forced to attempt the provision of treatment and care under deplorable material conditions and lack of finance. To my knowledge there has been no attempt at comparing the quality of community and hospital care under conditions which are comparable, that is, when the cost a head is the same. At present, in the London Metropolitan area at least, the cost of keeping a handicapped person in the community is roughly double that of keeping him in hospital.

Deterioration on Discharge

That the patients who are settled, clean, and happy, and giving little trouble in a hospital setting, do break down if they are not given the skilled nursing care which they have in hospital. This aspect is completely ignored when an attempt is made to assess hospital patients for suitability to transfer to community care. The claims that up to 50% of patients who are now cared for by the mental handicap services are not suitable for life in the community, either with their families or in hostels, are generally made by people who have little practical experience or knowledge in the field of mental handicap. Hostels that can take the same type of patients as hospitals has never been substantiated, and it is the experience of most clinicians that hostel authorities refuse to accept any patients who present any difficulties in the care they require or any behaviour deviations.

Needs of the Adult

The need to understand the social requirements of the adult. Most of the plans for services for the handicapped are based upon the emotional and social needs of young children and show a basic lack of understanding of adult social needs. Adults need to live in communities which give an opportunity for social interaction and, above all, allow individuals to function as participating members of the social group. These needs should be satisfied and the mentally handicapped live in a group composed of his intellectual peers. If the individual's intellectual capacity happens to be disproportionately high or low, identification with the social group becomes impossible. It is this aspect of the handicap—being a supportive community as well as a place of treatment, care, and training—that is so ignored at present. Our predecessors, whom it is fashionable to decry for lacking in humanity and perception, were in fact only too well aware of the social needs of people in their charge. This incidentally is one of the reasons why many present hospitals began as "colonies."

It is unfortunate therefore, that the Department, in spite of its acknowledgement that further research and investigation is needed, is committed to community care and to the exclusion of improvement in the quality of care in the hospitals to the point of stopping any building in large hospitals beyond one ward. The practical result of such a policy is that the majority of patients will be condemned to live in unacceptable conditions of overcrowding in large wards until such time as the community services are built up, and this may be many years. Secondly, the running-down of hospital services will have a very adverse effect on morale and recruitment,
and will ensure that the quality of the hospital services will deteriorate long before any alternative adequate provisions can be created. The recent investigations into conditions at the large juvenile hospitals show how dangerous poor staff morale can be to the wellbeing of patients.

There is yet another danger which has been adumbrated by the Batchelor report on the Scottish juvenile hospitals in Scotland, and that is that the care of the mentally handicapped will become divided between a number of specialists such as psychiatrists, general practitioners, and child psychiatrists, to whom the care of the mentally handicapped will present a fringe interest. Those who remember the dismally poor quality of the care for the aged before geriatrics was recognized to be an independent discipline will realize what a backward step such a fragmentation promises to be.

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2 Scandinavian Hospitals and Health Department, The Staffing of Mental Deficiency Hospitals, Edinburgh, H.M.S.O., 1970.

SIR—Miss Ann Shearer (4 December, p. 623) suggests that workers in the present hospitals are seeking to defend the existing pattern of residential care for the mentally handicapped in Britain by drawing false conclusions from Scandinavian practices. Without the co-operation and goodwill of the staff who care for the mentally handicapped the task of establishing new services will be harder, but the reasons for their scepticism are understandable.

This group of workers have suddenly found themselves spotlighted and made to feel scapegoats for years of parsimony and indifference towards the problems of the mentally handicapped by the community at large. It seems to them that the service which they have been giving for years has overnight become misplaced, misguided, and has apparently been in the wrong hands. In these circumstances it is not surprising that the morale of staff in many hospitals for the mentally handicapped is poor.

Scandinavian provision has been advanced as a model, but there is a limit to the amount of £60 per week per resident which can be accommodated. This is three to four times as much as is spent on mentally handicapped patients in the hospitals in Britain, which constantly deny staff and resources, have had little chance to improve their effectiveness. In sparsely populated Sweden there are remote and isolated institutions which appear to be as remote and isolated as any in Britain, even though material conditions in them are undoubtedly better. Despite the emphasis on community care and small units in Sweden (population 8,000,000) has nearly 2,000 places in so-called special hospitals which were excluded from the itinerary of a recent study tour, but which, it was reported, had been reported, had been disappointing, and severe and disturbed cases and where conditions, on the Swedes' admission, were not ideal. Hence the Swedish methods have not entirely eliminated hospitals, 7% of patients still being accommodated there.

It is these facts which prompt the suspicion that the protagonists of the Scandinavian system of provision are being disingenuous. The Swedes conceded that there is little voluntary service in their establishments for the mentally handicapped. Recent adverse reports about hospitals in Britain have emphasized the need for a drastic overhaul of this provision for the mentally handicapped. Unfortunately this has trapped many well-intended people into supposing that the solution of this entirely different system copied perhaps from another country can be applied to all cases. In practice the apparent solution of one problem always raises others. The mental handicap can be improved best by the application of a multidisciplinary and eclectic approach. The relevant contributions of particular modes of provision—hospital, hostel, home, or community care—for the mentally handicapped can be determined only on a basis of evolution and experience in relation to the ethos and resources of each nation. I am, etc.,

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Hospital-based Social Workers

SIR—I was very interested in the letters from Drs. G. L. Davies and A. G. Chisholm and Dr. C. F. J. Cropper (1 January, p. 50). In adult psychiatry there is needed a hospital-based psychiatrist. These are valuable if not essential part of a mental health team, and, indeed, their value is comparable in my view to that of a ward sister, charge nurse, or even a registrar.

Such workers have existed as part of the hospital staff, but in many areas they have also existed as part of the local authority staff by courtesy of the medical officer of health—I refer to the mental welfare officers. I consider their removal to the social services department to have been a retrograde step in the teeth of expert opposition and advice. I think it arose through a semantic confusion through the words "welfare" and "social work" in the title.

What we really need is a psychiatric health visitor, and I think these should be recruited through a registered mental nurse training with a subsequent training in the methods and scope of the various other social services, and I think they should be employed by the area health boards to come.

The new circular from the Department of Health and Social Security, Hospital Services for the Mentally Ill, talks of teams, including a social worker. I think this post should be retitled psychiatric health visitor and the latter should be part of the team and not seconded from somebody else's team.—I am, etc.,

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Hypoxic Newborn Infants

SIR—Dr. J. S. Wigglesworth (1 January, p. 53) states that the burden of our paper (27 November 1971, p. 516) was to demonstrate an association between asphyxia at birth and blood coagulation changes in the full-term newborn infant. He is quite right. Drs. Chessel and Wigglesworth's paper, which appeared after our paper was accepted for publication, also gives evidence suggestive of such a relationship in babies of various gestational groups who were severely asphyxiated and required ventilation, though their series does not include results for matched control infants.

The results of our observations strongly suggested that the hypoxic babies had disseminated intravascular coagulation. Evidence for this included lowered platelet counts, raised levels of fibrin degradation products, and prolonged thrombin clotting times. Hence we believe that babies who have sufficient asphyxia to cause a severe consumption coagulopathy are at serious risk of spontaneous haemorrhage, as the process of intravascular coagulation is accompanied by a reduction in certain coagulation factors.

An association between disseminated intravascular coagulation in the newborn and certain complications during pregnancy has been reported. It is therefore relevant that in our series antenatal complications (either pre-eclamptic toxemia or antepartum haemorrhage) had occurred in 46% of the anoxic infants but with only 17% of the control babies. Two infants in our series who had severe asphyxia died. Both had Apgar scores of 0 at birth and required ventilation. One of these showed intracranial haemorrhage at postmortem. The parents of the other baby refused permission for necropsy, but as it had a falling haematoctrit and a full fontanelle at death the diagnosis of intracranial haemorrhage seems likely.

We are grateful to Dr. Wigglesworth for drawing attention to the errors in Table I of our paper. The gestation in both groups was 39 and not 35 weeks as shown. The data for rectal temperatures in the two groups were inadvertently transposed: the percentage of babies who had had a rectal temperature of less than 35°C was 25% in the hypoxic group and 4% in the control group.—We are, etc.,

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Clotting Factor Concentrates

SIR.—Your leading article (8 January, p. 66) on the need for concentrates of the prothrombin complex, particularly for treatment of warfarin, prompts us to report our experience in this field.

We are just completing a pilot study on the feasibility of preparing such a concentrate at the centre. We chose the method of Brunings and Loeliger, with slight modifications, for the following reasons: (1) supernatant ACD...