Scottish audit of suicides provides useful data

EDITOR,—Steffan Davies and colleagues report on the difficulty in identifying people at risk of suicide in the years after an admission to a psychiatric hospital.¹ Of their cohort of 91 patients, none were found to have died by suicide in the following 16 years.

Despite their findings it is important not to underestimate the proportion of people dying by suicide who have had contact with inpatient psychiatric services. Using the Scottish linked dataset,² we have examined the inpatient psychiatric history of people recorded as dying by suicide in Scotland in 1991 and 1992 (812 men and 282 women). We excluded 15 people whose date of death was the same as their date of discharge and who may therefore have committed suicide as inpatients.

We found that 98 women and 152 men had been inpatients in psychiatric hospitals in Scotland at least once in the 10 years preceding their death. Fifty two women and 77 men had been psychiatric inpatients in the 12 months immediately before their death.

More detailed examination of the data may help to identify factors associated with death by suicide after discharge. In keeping with the findings of Goldacre *et al.*,³ we found that most former psychiatric inpatients who committed suicide did so in the year after discharge. The linked dataset has obvious potential as an audit tool and as a source of outcome measures for psychiatric services.

Although the linked dataset does not provide any information on people who have only outpatient contact with psychiatric services, evidently a larger proportion of men who commit suicide in Scotland than of women have no recent history of psychiatric treatment as an inpatient (χ^2 test, $P<0.01$). With the increase in suicide⁴ and discharges for parasuicide⁵ among men in Scotland, detailed examination of the characteristics of men dying by suicide is required to identify other possible routes of intervention.

CAMERON STARK
Senior registrar in public health medicine
Argyll and Clyde Health Board,
Paisley PA2 7BN

HELEN SMITH
Locum consultant in public health medicine
DAVID HALL
Senior registrar in psychiatry
Mental Welfare Commission,
Edinburgh

FIONA O'BRIEN
Health information scientist

Record Linkage Project,
Information Services Directorate,
Edinburgh

- 1 Davies S, Buckley A, Naik P, Lee AS. Prevention of suicide. *BMJ* 1994;309:196-7. (16 July.)
- 2 Kendrick S, Clarke J. The Scottish record linkage system. *Health Bulletin* 1993;51:72-9.
- 3 Goldacre N, Seagroatt V, Hawton K. Suicide after discharge from psychiatric inpatient care. *Lancet* 1993;342:283-6.
- 4 Crombie IK. Suicide in England and Wales and in Scotland: an examination of divergent trends. *Br J Psychiatry* 1990;157: 529-32.
- 5 Stark C, Hall D, Smith H. Increase in parasuicide in Scotland. *BMJ* 1994;308:1569-70. (11 June.)

Water birth and infection in babies

EDITOR,—J Rawal and colleagues' report of a case of infection in a baby born in a birthing tub¹ followed previous observations of contamination of birth pools.² We recently reviewed infection in the babies born to mothers who had used such a pool in labour.

From December 1991, 122 mothers used the pool in labour, of whom 41 delivered in the pool. Our policy is to swab the ears of all infants whose mothers have used the pool and record their respiratory rate for three hours after delivery.

Three of the 122 babies had positive ear swabs. Two of them were well with their mothers on the postnatal wards. The swabs grew group B streptococci and *Staphylococcus aureus*, and both babies were treated with antibiotics until further cultures were negative. The last baby presented at 10 days with greenish discharge from his ear. Initial ear swabs had grown *Pseudomonas aeruginosa* and *Escherichia coli*. He was treated with parenteral antibiotics for 48 hours followed by topical antibiotic ear drops. His recovery was unremarkable.

Five of the 122 infants were admitted to the special care baby unit with a raised respiratory rate or grunting. Four of the five had been delivered under water. All were treated with antibiotics, though in all swabs and blood cultures were negative. We have had one neonatal death from an unexplained birth asphyxia but no clinical evidence of hyperthermia.³

In this unit bacteriological surveillance of the birth pool continues. In addition to taking a sample of water after delivery, as described by Rawal and colleagues, we also take a sample for culture before the woman's immersion. This enables us to check that the bacteriological quality of the water in the pool is satisfactory and to allow the identification of any problems at an early stage. We also advise that when using a plumbed birth pool the taps are opened for five minutes each day. This will reduce the risk of contamination from water, which may remain both static and tepid in the dead leg if the pool has not been used for several days. We let water flow for two minutes before filling the pool. Cleaning and drying the pool after use are also important.

R COOMBS
Consultant paediatrician
H SPIBY
Midwifery research sister
P STEWART
Consultant obstetrician and gynaecologist

Northern General Hospital NHS Trust,
Sheffield S5 7AU

Public Health Laboratory,
Northern General Hospital NHS Trust,
Sheffield S5 7AU

- 1 Rawal J, Shah A, Stirk F, Mehtar S. Water birth and infection in babies. *BMJ* 1994;309:511. (20-27 August.)
- 2 Robb EJ, Spiby H, Stewart P, Norman P. Hygiene in birthing pools (letter). *Nursing Times* 1991;87:14.
- 3 Rosevear SK, Fox R, Marlow N, Stirrat GM. Birthing pools and the fetus. *Lancet* 1993;342:1048-9.

High security for mentally disordered people

EDITOR,—Derek Chiswick highlights the numerous difficulties inherent in the provision of high security care for people with mental disorders.¹ He states that high security care is provided for those patients "who present a serious danger, usually to others, and who cannot be managed at a lower level of security." One inference that may be drawn from this statement is that patients' dangerousness to themselves may be a reason for admission to a special hospital. The Reed report states that this should be an exceptional occurrence, describing admission to high security hospitals as "for patients with severe mental disorders (including learning disabilities) who are liable seriously to endanger others or (in extreme cases) themselves."²

The report on complaints about Ashworth Hospital expressed concern that some patients were being admitted inappropriately to a special hospital and recommended that the Special Hospitals Service Authority should review whether its criteria for admission were being followed in practice.³ These criteria include among patients not generally considered to be suitable for admission those who require close observation to

prevent self injury, unless this is associated with a probability of violence to others.

The unique nature of the special hospitals provides care for patients who need maximum security. Can a high perimeter wall be justified to prevent self harm?

ADRIAN BERRY
Honorary senior registrar

Rampton Hospital,
Retford,
Nottinghamshire DN22 0PD

- 1 Chiswick D. High security for mentally disordered people. *BMJ* 1994;309:423-4. (13 August.)
- 2 Department of Health. *Report of the working group on high security and related psychiatric provision*. London: DoH, 1994. (Reed report.)
- 3 Department of Health. *Report of the committee of inquiry into complaints about Ashworth Hospital*. Vols I and II. London: HMSO, 1992.

Embryo and oocyte transfer in older women

EDITOR,—C J Redgment and colleagues raise the important issue of whether women over 40 are being penalised by the Human Fertilisation and Embryology Authority's restriction on the number of eggs that may be replaced during gamete intrafallopian transfer.¹ The same principle applies to the number of embryos transferred after in vitro fertilisation. It is a pity that the authors did not show the number of eggs transferred per woman or take account of diagnostic differences that may affect implantation, such as sperm dysfunction, in order to compare accurately the risks of multiple pregnancy before and after the regulatory restrictions were imposed.

We have studied implantation rates of embryos transferred to the uterus after in vitro fertilisation in a strictly comparable group of patients according to the woman's age. All first cycles of standardised treatment between July 1989 and June 1993 in couples with normal sperm function, normal ovulation, and a normal uterus were included. The table shows that implantation rates fell slightly with age up to 40, after which the rate halved. This effect was independent of the number of embryos available, from which up to three could be chosen for transfer. Women aged 40 and over had a significantly lower pregnancy rate per cycle and live baby rate (without any use of therapeutic reduction of pregnancy).

In our clinic we have always transferred a maximum of three (or, before August 1991, exceptionally four) embryos or eggs per cycle of in vitro fertilisation or gamete intrafallopian transfer. In our total experience of 1967 cycles of these procedures in women under 40 and 239 cycles in women of 40 and over we have achieved overall clinical pregnancy rates of 26% (n=511) and 16% (38) per egg collection in the respective age groups; the rates of twins, triplets, and quadruplets among pregnancies were 28%, 5%, and 1% respectively in women under 40 and 14%, 0%, and 0% in women aged 40 and over. More extensive and useful data would be available if the British national figures

Results of in vitro fertilisation related to number of embryos transferred and woman's age

	Age of woman (years)					P
	25-29	30-34	35-39	40-44	value	
No of cycles in which embryos were transferred	122	242	217	48		
Mean No of embryos transferred	2.7	2.8	2.8	2.5		
Clinical pregnancy rate (% of cycles)	34	28	29	15	0.01	
Livebirth rate (% of cycles)	30	23	25	8	<0.05	
Implantation rate (sacs as % of embryos)	17	15	14	6	<0.05	
Live baby rate (babies as % of embryos)	14	11	11	3	<0.01	

published annually by the Human Fertilisation and Embryology Authority² included rates of multiple pregnancy and birth rates according to both the woman's age and the number of embryos transferred.

Any policy allowing numerous embryos or oocytes to be replaced entails a calculated risk of multiple pregnancy. Our data support the point made by Redgment and colleagues that the principle underlying the present policy leaves room to raise the number of embryos or eggs replaced in women aged 40 and over to try to increase their pregnancy rates while keeping rates of multiple pregnancy down to what is currently acceptable in women under 40.

CHARLOTTE FLEMING
Clinical research fellow
LISA JOELS
Clinical research fellow
M G R HULL
Professor

University of Bristol,
Department of Obstetrics and Gynaecology,
St Michael's Hospital,
Bristol BS2 8EG

- 1 Redgment CJ, Al-Shawaf T, Grudzinskas JG, Craft IL. Gamete intrafallopian transfer in older women: effect of limiting number of gametes transferred. *BMJ* 1994;309:510-1. (20-27 August.)
- 2 Human Fertilisation and Embryology Authority. 3rd Annual report (for 1992). London: HFEA, 1994.

Ulcerative colitis and Crohn's disease

EDITOR,—Anne Ferguson's editorial on ulcerative colitis and Crohn's disease has one curious omission.¹ Ferguson asks, "Why is there so little knowledge about the causes of two such serious, common, and chronic diseases—and no sign of cure?" But she does not mention that both diseases can be exacerbated by foods that are not tolerated, and she does not discuss the importance of this for the understanding of causation.

Intravenous feeding or hypoallergenic oral formulas are used to bring Crohn's disease into remission, and the two controlled trials that have examined the issue both found that food challenge followed by the avoidance of foods that were not tolerated significantly prolonged the duration of remission.^{2,3} Responses in ulcerative colitis are less consistent, but each of us knows of patients with proved ulcerative colitis in whom a projected colectomy was rendered unnecessary by a full investigation of allergy and appropriate avoidance or specific prophylaxis, or both; patients remained well for years unless they inadvertently ate one of the foods that they could not tolerate. McEwen showed that specific prophylaxis with enzyme potentiated desensitisation (without a preliminary exclusion diet) resulted in better long term outcome than placebo.⁴

Patients with these conditions must be closely supervised during food challenges to prevent reactions setting off a relapse. This can be achieved by adjusting their drug treatment or by curtailing symptoms by using the neutralisation technique.⁵

Exacerbation by certain foods (different ones for different patients) indicates an environmental element in the causation of these diseases. The prevalence of other chronic diseases in which similar exacerbations are described—eczema, asthma, and the irritable bowel syndrome—has also increased in the past 40 years.⁶ So has the prevalence of hay fever, which was first described after the start of the industrial revolution by Bostock in London in 1819; in the next nine years he heard of only 18 other cases.

The hypothesis that the increase in these diseases is due to increased chemical pollution of food, air, and water would be difficult to prove or disprove but should be urgently addressed because

of the seriousness of future prospects if it was true and remained unrecognised. Some of the polluting chemicals are known to be immunological adjuvants.

GEORGE HEARN
Honorary consultant physician

City Hospital Trust,
Birmingham B18 7QH

JONATHAN MABERLY
Consultant physician
HONOR ANTHONY
Clinical assistant

Airedale General Hospital,
Sreeton,
Keighley BD20 6TD

- 1 Ferguson A. Ulcerative colitis and Crohn's disease. *BMJ* 1994; 309:355-6. (6 August.)
- 2 Alun-Jones VA, Hunter JO. Crohn's disease: maintenance of remission by diet. *Lancet* 1985;ii:177-80.
- 3 Riordan AM, Hunter JO, Cowan RE, Crampton JR, Davidson AR, Dickinson RJ, et al. Treatment of active Crohn's disease by exclusion diet: East Anglian multicentre controlled trial. *Lancet* 1993;342:1131-4.
- 4 McEwen LM. A double-blind controlled trial of enzyme potentiated hyposensitisation for the treatment of ulcerative colitis. *Clinical Ecology* 1987;5:47-51.
- 5 Subcommittee of British Society for Allergy and Environmental Medicine and British Society for Nutritional Medicine. *Effective allergy practice: a document on standards of care and management for the allergy patient*. Southampton: BSAEM, BSNM, 1994.

GMC reconsiders its procedures

EDITOR,—I was concerned to read Philip Thomas's article about Dr AB, who had to retire on grounds of ill health.¹ The article discusses the effect of a letter that Dr AB received from the General Medical Council after applying for exemption from the annual retention fee. I am sorry that the letter caused distress. The offending comments were incorporated at the suggestion of a highly experienced medical member of the council and were intended to encourage Dr AB to be optimistic about the possibility of a full recovery.

My colleagues strive to treat all members of the profession, but particularly those who are ill, with respect and courtesy. Good intentions seem to have gone astray on this occasion. We are looking again at our procedures—specifically, whether in these circumstances it is appropriate to convey such information in this way.

ROBERT KILPATRICK
President

General Medical Council,
London W1N 6AF

- 1 Thomas P. Who cares for those who care? *BMJ* 1994;309:747. (17 September.)

Doctors' right to refuse to perform abortions

EDITOR,—Dolores Dooley asks why doctors are given a right to conscientious refusal to perform abortion but nurses are not given the right to refuse to assist.¹ But why were doctors given an open ended right to refuse in the first place? Correctly, gynaecologists already in post and those already in training when the Abortion Act became law were given the right to refuse to perform abortions, but why did that right carry on? All those who entered training in obstetrics and gynaecology after 1967 must have known that they would be called on to perform abortions. If they felt that they could not do so they should have opted for training in another branch of medicine. Now we have the absurd situation in which newly appointed consultants can announce after their appointment that they will not perform abortions. Is there really such a thing as a right to become a gynaecologist?

Surely, doctors exist to meet the needs of patients, not the other way round.

Instead of extending this right to refuse from doctors to nurses we should be curtailing the open ended right erroneously given to doctors.

C G B SIMPSON
Consultant pathologist

Bronglais General Hospital,
Aberystwyth,
Dyfed SY23 1ER

- 1 Dooley D. Conscientious refusal to assist with abortion. *BMJ* 1994;309:622-3. (10 September.)

Solving the population problem

EDITOR,—A J McMichael's editorial on the Cairo conference on population and development presents the public health imperative to reduce world population growth.¹ But in viewing the problem as a straightforward interaction between health and the number of people sharing a finite resource the editorial is surprisingly short of answers. Could the reason for this be that the author fails to give enough importance (surprisingly so for an epidemiologist) to the confounding effect of poverty?

At the risk of being branded heretics, we would suggest that public health is irrelevant to the debate on population. Public health in Britain was terrible in Victorian England, when the population was much smaller. In modern day India, where public health is generally bad, the better off sections of the population enjoy fairly good health. By contrast, in the United States, where public health is generally good, segments of the population are worse off than the populations in some Third World countries.

This is not to say that there isn't a population problem. There is, but it is compounded, and to an extent fuelled, by the problems of poverty and unequal distribution and consumption of resources. The conventional view of the global population problem as being entirely a problem of inexorably rising numbers of people, particularly in poor countries, leads equally inexorably to the knee jerk response of "more contraception." A week of futile discussion in Cairo centred on the attempt to get a consensus on such irrelevancies as the availability of contraception and abortion. All the evidence from research studies and past experience indicates that the most that can be expected from freely available contraceptive services is a drop in the number of unwanted pregnancies. Women find it easier to attain the so called desired family size.

The real challenge is to alter the popular perception of desired family size by raising the opportunity cost of having a baby. This calls for a mix of economic, educational, land use, and social policies, which need international agreement and support, as well as sacrifices on the part of rich countries. It may come as a surprise to those who are horrified by the prospect of billions of citizens of the Third World demanding a share of the wealth of the earth that these policies are also those that promote economic growth, reduce poverty, and lead to a more equitable distribution of wealth.

As the *Economist* summed it up: "Visitors to Cairo, please note: look after poverty and population will (largely) take care of itself"; so, we might add, will public health.

VIDYA RAO
Lecturer in community child health

University of Nottingham,
Nottingham NG7 2UH

JAMMI NAGARAJ RAO
Public health physician

Sandwell Health Authority,
West Bromwich B71 4NA

- 1 McMichael AJ. Cairo conference. *BMJ* 1994;309:554-5. (3 September.)
- 2 A populous planet [editorial]. *Economist* 1994 Sep 3:16.