Emergence of the literature of general practice

Sir,

In his McConaghey memorial lecture (June *Journal,* p.228) Professor Pereira Gray states, 'In 1958 two books were written by general practitioners but not on clinical care'. One of these was my book *Introduction to general practice.* In fact the first edition was published in September 1953 and clinical matters occupied all but 37 of the total 529 pages. One reviewer described the book as 'an excellent and comprehensive textbook' and there were many laudatory reviews. Eight hundred and four copies were sold in the first 10 months and a second edition followed in 1958. A third edition, expanded to 729 pages and entitled *A short textbook of general practice,* was published in 1976. The book sold continuously from 1953 to 1988. In 1977 Dr Michael O'Donnell wrote in a letter to me 'It was the first book I ever read that helpfully described the sort of medical problems that occur in general as opposed to hospital practice. I still possess my well-thumbed copy'.

In conclusion I would like to pay tribute to Dr McConaghey's work as founding editor of the *Journal.* I met him several times in committee during the early years of the College and found him to be a thoughtful and quietly inspiring man.

DENIS CRADDOCK

36 Lackford Road
Chipstead
Surrey CR3 3TA

Professor Pereira Gray writes: I am grateful to Dr Craddock for drawing attention to these errors and I am sorry that they occurred.

Birmingham diabetes survey

Sir,

Findings from the Birmingham diabetes survey have been published from time to time but there remains a mass of detailed data and *ad hoc* findings which will be of interest to those working in the field of the natural history and epidemiology of glucose intolerance and diabetes. Briefly, the data covers the 10-year follow-up period of the 493 glycosuric patients who were uncovered in the 18 413 population surveyed in 1970. Glucose tolerance tests were carried out on 783 non-diabetic patients as followed up at five years and 10 years. The changes in status of glycosuria and of the various categories of the glucose tolerance test were recorded along with clinical and mortality data. The findings are displayed in some of the tables. A copy of this 100 page document can be obtained from the address below. There is a charge of £2.50 to cover the cost of production and postage. Cheques should be made payable to RCGP no. 2 A/C.

D.L. CROMBIE

RCGP Birmingham Research Unit
54 Lordswood Road
Harborne
Birmingham B17 9DB

DIGEST

This month • drugs in Brazil • athlete's foot and asthma • elderly • jet lag • colorectal cancer • consultation length • lumpectomy

WEST OF SCOTLAND JOURNAL CLUB

Misuse of drugs in Brazil

HAAK, a Dutch researcher, has looked at the extent of pharmaceutical misuse by the local population in two villages in rural Brazil. Brazil has a population of nearly 200 million, 50% of whom are aged under 25 years, a land mass the size of Europe and the largest external debts in the world. The well-heeled sophistication of the inhabitants of Rio and Sao Paulo contrasts with the 80% of the population who live in poverty in the Brazilian countryside.

Haak examined 30 families with a calendar of disease and drug treatment. Fifty per cent of health problems were treated with modern medicines although only 22% of these medicines were prescribed by a doctor. The majority of medicines used were not on the World Health Organization list of essential drugs for the third world and consisted mainly of vitamins and antibiotics. The cost of the drugs per week for each family was equivalent to one days work for the breadwinner.

Vitamins were used to prevent ill health, despite the abundance of local foods, and they were prescribed by the local doctors as well as by pharmacists. In a country where the cost of an orange can be less than a penny it seems crazy for vitamin C tablets to be widely available.

Antibiotics were used for most diseases without discrimination. This has been documented before in other studies of the third world where antibiotics are freely available without prescription. This must lead to the emergence of drug resistance much more quickly than the occasional inappropriate prescribing of penicillin V for a sore throat in the UK.

This fascinating paper reinforces my own observations from a three month medical student elective in Brazil. It quantifies the problem and describes in detail factors leading to this situation, including the government's inability to control the pharmacists and drug companies, the local doctors' lack of prescribing power, and the local pharmacists' sway over the population. Local beliefs about health and treatment are also involved and must be addressed by those hoping to deal with the problem. My most vivid memory of Brazil was of the bottles of cough medicine in the government pharmacy, but nothing to treat tuberculosis, because all the money for the year had been spent on the recent election.

(J.A.)

Source: Haak H. Pharmaceuticals in two Brazilian villages: lay practices and perceptions. *Soc Sci Med* 1988; 27: 1415-1427.

Athlete's foot and asthma

INHALED fungi are known to trigger asthma and there have been a few isolated reports of dermatophyte infections causally associated with asthma. American and Swedish investigators have recently been pursuing this link in a series of reports including a recent clinical study in 12 adult male outpatients with chronic fungal infections of skin or nail, asthma and demonstrable immediate hypersensitivity to tricho-phyton. They were compared with 15 volunteers (five asthmatics) who had neither dermatophyte infection nor any demonstrable IgE response to tricho-phyton. After appropriate wash out periods from anti-allergy and anti-asthma

therapy, subjects and controls underwent bronchial and nasal challenges with purified *Trichophyton tonsurans* extracts of varying dilutions. Ten subjects (no controls) had a 20–50% fall in forced expiratory volume. Nasal provocation tests showed significant nasal obstruction, sneezing and secretion (all $P<0.01$) in subjects.

Trichophyton infection of skin and toenails is common and in many adults delayed hypersensitivity develops. Eight out of 12 subjects improved after antifungal therapy in this study. Perhaps general practitioners should be looking at the feet of their patients with chronic 'intrinsic' asthma.

(F.S.)

Source: Ward GW, Karlsson G, Rose G, Platt-Mills TAE. Trichophyton asthma: sensitisation of bronchi and upper airways to dermatophyte antigen. *Lancet* 1989; **1:** 859-862.

Prevention of falls in the elderly

EACH year 30% of elderly people living in the community and 50% of those in institutions suffer a fall, which may lead to loss of confidence, severe soft tissue injuries, fractures, or even death. Many falls appear to result from the accumulation of factors intrinsic to the patient, factors related to activity at the time and environmental factors.

Prevention of falls involves the identification of risk factors so that the high risk patient can be targeted. The authors of this article provide a valuable summary of chronic, short-term, activity-related and environmental risk factors. Further help in assessment is provided in the form of three summary checklists for the physician: (1) intrinsic risk factors for falling and possible intervention; (2) elements in the assessment of balance and gait: (3) environmental factors in the home to be considered.

The authors also remind us that the need to preserve freedom and independence should be a high priority for all those concerned with improving the safety of our elderly.

(V.O.)

Source: Tinetti ME, Speechley M. Current concepts — geriatrics: prevention of falls among the elderly. *N Engl J Med* 1989; **320:** 1055-1059.

Effect of melatonin on jet lag

AS those who jet around the world will testify, jet lag can upset the best laid plans. A paper in the *British Medical Journal* reports that the use of the pineal gland hormone melatonin reduces the symptoms of jet lag.

In a double blind placebo controlled crossover trial using 20 volunteers flying from New Zealand to London, subjects took 5 mg of melatonin or placebo for three days before the flight, during the flight and for three days after their arrival. They took the capsule at the same time each day on their body clock. Three weeks later they returned, crossing over to take either placebo or melatonin.

The study showed that when the subjects were taking melatonin they reported significantly less jet lag overall (mean score 2.15 versus 3.40) with fewer days needed to return to normal sleep patterns (2.9 versus 4.2 days), to not feeling tired during the day (3.0 versus 4.6 days) and to a normal energy level (3.3 versus 4.7 days).

The side effects were minor. Mild sedation occurred in two out of the 20 volunteers on melatonin and one out of 20 on placebo. Increased relaxation occurred in one volunteer taking melatonin and one taking placebo.

This is a well controlled study which suggests that it is worth buying shares in the drug company which produces the first commercial version of melatonin for the treatment of jet lag.

(J.A.)

Source: Petrie K, Conaglen JU, Thompson L, Chamberlain K. Effect of melatonin on jet lag after long haul flights. *Br Med J* 1989; **298:** 705-707.

GPs can reduce deaths from colorectal carcinoma

DURING the decade 1977–86 33 000 people living in the Plymouth health district died at home, of whom 5782 (17.5%) underwent an autopsy. In 61 cases an unsuspected colorectal carcinoma was discovered which was thought to be the primary cause of death for 57 of these patients (obstruction 15, perforation 11, bleeding one, enterocolic fistula one, carcinomatosis 26). The authors felt that a potentially curative resection would have been possible for 34 of the study subjects. They extrapolate their figures to the UK national perspective to suggest that 800 patients may die at home annually of unsuspected colorectal carcinoma.

There is some consideration of the value of faecal occult blood screening in patients over 50 years old, a programme which would certainly detect a number of cases. Most of the discussion, however, centres on clinical detection. Ten tumours could have been discovered by rectal examination and 40 visualized by sigmoidoscopy. General practitioners must remember the value of a per rectum investigation in the appropriate clinical settings. Their clinical skills would be encouraged by greater access to a fibreoptic sigmoidoscopy clinic and an unrestricted barium enema service.

(F.S.)

Source: Armstrong CP, Whitelaw SJ. Death from unsuspected colorectal carcinoma. *Ann R Coll Surg Engl* 1989; **71:** 20-21.

Quality and use of time

QUALITY or quantity of care? This key question is addressed by this study of 1700 consultations for respiratory illnesses carried out by 85 general practitioners in and around Edinburgh over one year. Length of consultation, average consultation time, and quality of care were measured. For quality of care the authors looked at the management of identified psychosocial problems and antibiotic prescribing.

They found that doctors could be categorized into three groups depending on their average consultation time — slow (over nine minutes), intermediate (six to nine minutes), and fast (less than six minutes). Individual consultations could also be separated into less than six minutes, six to nine minutes and nine minutes. Although the doctors were volunteers who may be untypical of all of general practitioners, the size of the sample must help to lessen this bias. The list sizes showed a gradient, with the 'slower' doctors having a lower average list size (2169 for doctors with average consulting time less than five minutes and 1476 over nine minutes).

The results are interesting. Antibiotics were more likely to be prescribed by the 'faster' doctors for all consultations, but when the results for individual consultations over nine minutes were examined there seemed to be no difference in prescribing rates between 'faster' and 'slower' doctors. Slower doctors behaved like fast doctors in quick consultations.

When a psychosocial problem was identified, faster doctors were less likely to deal with this in depth than slower doctors. There was a three-fold difference in the chance of a psychosocial problem being dealt with at a long consultation than in a short one. In slow doctors, if no psychosocial problems were found or dealt with, antibiotics were more likely to be prescribed (54% versus 45%).

The authors argue that these measures of quality, antibiotic prescription and psychosocial management are a function of how time is managed rather than personal clinical behaviour. The slow and fast doctors identified the same number of psychosocial problems when separate analysis of short and long consultations was carried out.

Howie had suggested earlier (meeting of Scottish university departments of general practice, 26 January 1989) that it may be in the first five minutes of the consultation that the physical problems are dealt with. In the second half of the consultation psychosocial problems may be identified and managed. In the present climate of discussions on the new contract this may be one of the most important pieces of operational research to emerge in the last few years. If consultation times become shorter as a reaction to larger list sizes, what will happen to the management of psychosocial problems and to patient satisfaction?

(J.A.)

Source: Howie JGR, Porter AMD, Forbes JF. Quality and the use of time in general practice: widening the discussion. *Br Med J* 1989; **298:** 1008-1010.

Effectiveness of lumpectomy

THERE is still debate as to the effectiveness of lumpectomy and radiotherapy compared with total mastectomy for stage 1 and 2 breast cancer. Results published in 1985 showed a five-year survival rate of 85% for lumpectomy/radiotherapy compared with 76% for total mastectomy. In this study observations were extended through eight years of follow-up.

It was found that 90% of the women treated with lumpectomy and radiotherapy remained free of tumour recurrence in the same breast compared with 61% of those not given adjuvant radiotherapy. Of women who also had positive axillary nodes and therefore received additional chemotherapy, only 6% had a recurrence of tumour in the same breast. Compared with total mastectomy, there was no significant difference in rates of disease-free survival, distant disease-free survival and overall survival.

The findings therefore continue to support the use of lumpectomy in patients with stage 1 or 2 breast cancer. In addition, adjuvant radiotherapy was found to reduce the probability of local tumour recurrence.

(V.O.)

Source: Fisher B, Redmond C, Poisson R, *et al.* Eight-year results of a randomized clinical trial comparing total mastectomy and lumpectomy with or without irradiation in the treatment of breast cancer. *N Engl J Med* 1989; **320:** 822-828.

Contributors: Jonathan Anderson, Glasgow; Frank Sullivan, Glasgow; Valerie Oates, Glasgow.

INFECTIOUS DISEASES UPDATE: AIDS

Fifth international conference on AIDS: part 1

Like the number of registered cases of AIDS, the number of people attending the annual AIDS conference grows and grows. This year almost 12 000 delegates and 2000 members of the press made their way to Montreal for the six day event, though not all were satisfied. Most complained that it was too crowded, and some could not come to terms with the presence of large numbers of various pressure groups run by people with AIDS and HIV. However, the overall impression after the conference was positive and it is likely that most participants will attend the 1990 conference in San Francisco where 16 000 are expected.

In terms of scientific progress, although few if any startling breakthroughs were announced, thousands of presentations emphasized the enormous amount of work being generated in this field. In spite of this year's findings being often confirmatory and consolidatory, they nevertheless permitted the evolution of last year's 'possible' into this year's 'probable'.

A vaccine and a cure are still many years away but there still remains optimism on both fronts. Researchers are well on the way to identifying the appropriate antigen(s) required to illicit an immune response to protect against infection. However, we have already learnt from hepatitis B that the development and licensing of such a vaccine might take almost 20 years after the decision on which antigen(s) to use.

At present 'soluble CD4' seems to be the most promising therapeutic strategy against HIV. Since HIV has such an affinity for the CD4 molecule the plan is to copy it pharmacologically and then deliver it to the infected patient. It would then act as a molecular decoy to which the virus would bind.

In the meantime the use of zidovidine in patients with AIDS and AIDS related complex certainly prolongs life, but at the end of the second year the survival rate is still only 20–40%. Earlier treatment may well be more efficacious and seven studies worldwide are currently being conducted in asymptomatic patients. Since the main problem with zidovidine is its toxicity, particularly at higher doses, it is likely that it will be used in the future in combination with other drugs. Such cocktails, which are often less toxic and additive or synergistic in effect, are of course being used in other branches of medicine sometimes with great success, for example, in childhood leukaemia. Of some concern, however, is the finding that isolates from some patients with symptomatic disease treated with zidovidine for six months showed some decrease in sensitivity.

With regard to progression rates towards AIDS, studies of homosexuals and haemophiliacs are consistent in their findings, with 40–50% progression by the tenth year following infection.

Aerosolized pentamidine is now widely considered to be an effective means of preventing the onset or recurrence of *Pneumocystis carinii* pneumonia in patients with progressive disease.

The importance of drug use in the AIDS epidemic was clearly apparent at this conference. Indeed the difficulties in controlling the spread of HIV within and from this high risk group was never better emphasized than by the findings from Bangkok. In January 1987 the HIV prevalence in intravenous drug users was 0%. This rose to 20% by the summer of 1988 and is now 40%.

The cost of AIDS is enormous. In New York where approximately 200 000 people are infected with HIV the estimated cost of the epidemic will exceed $7 billion in the next five years.

Contributed by Dr D. Goldberg, AIDS Surveillance Programme Scotland, Communicable Diseases (Scotland) Unit, Ruchill Hospital, Glasgow G20 9NB.

A further report on the conference will appear in a future AIDS update.