A great thirst for knowledge

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A large proportion of our most effective drugs for the management of serious illness and the alleviation of symptoms has been discovered in the last three decades. These include the penicillin esters, loop diuretics, β -adrenoceptor blockers, histamine H_2 -receptor antagonists, calcium channel blockers, most antidepressant agents, many antipsychotic agents, non-barbiturate hypnotics, ACE-inhibitors, cephalosporin antibiotics, and all benzodiazepine sedatives apart from chlordiazepoxide. Add to this non-steroidal anti-inflammatory drugs, selective β_2 -adrenoceptor agonist antiasthmatic inhalers, oral contraceptives, and one begins to realise that the last 30 years has been the golden age of pharmacological research and development, leading to ever more effective, safe, and tolerable treatments. The majority of them are suitable for use in general practice. Hand in hand with the research and development of new therapeutic agents has been an explosion in the scientific understanding of intracellular metabolism, molecular biology, and the mechanism of drug action.

Unfortunately practising doctors' understanding of pharmacology has not kept pace with these advances. We often find ourselves using drugs after the fashion of a recipe, with no clear idea of what cellular mechanism we are targeting, or of what the biochemical and physiological results of our intervention will be. This is not the fault of the doctor. Even today the majority of British medical schools confine the teaching of pharmacology to about 50 lectures spread through first and second year undergraduate medicine, and therapeutics is often left to the idiosyncratic personal preferences of individual clinical teachers in later years. There is no final examination in therapeutics; no formal teaching of therapeutics and pharmacology during the preregistration year or vocational training period; and certainly no examination in pharmacology or therapeutics for any of the Royal Colleges' further qualifications.

Considering that prescribing is the most scientific activity undertaken by a general practitioner and needs to be conducted rationally, it seems intolerable that a quality-minded profession, many of them members of a college whose avowed aim is the advancement of standards in general practice, should allow this status quo to persist. To educate all general practitioners to modern levels of understanding of drug therapy is certainly a daunting task, but is that in itself sufficient reason for

Table 1 Proposed postgraduate diploma in prescribing science/drug therapy

Modules	Number of evenings
1. Introduction to Clinical Pharmacology	6
2. In-depth study of the 60 essential GP drugs	10
3. Clinical trials in GP	1
4. How to conduct successful peer review audit	1
5. Course work: individuals will produce agreed formularies for their own practice	own time
6. Prescribing economics (a) DHSS/Area Board (b) Pharmaceutical Industry	1
7. Prescribing and the microcomputer	1
Timing —1st week of October, 1993—last week of March 1994. Exam on last evening.	
If successful, repeat according to demand.	
Maximum class size—50 Minimum class size—10	
Restriction: GPs and GP trainees only. (A separate course might be run for prescribing nurses)	
Diploma ceremony in May 1994.	

failing to attempt it? (McGavock, 1990). During 1990 and 1991, I piloted a postgraduate prescribing science course for two small GP groups, one of 6 and one of 10. Due to the success of this, it was decided to propose a university extra-mural course leading to a postgraduate diploma in prescribing science, one evening per week from October to March, structured as in Table 1. All 960 general practitioners in Northern Ireland were informed by letter of this proposal, and asked:

- were they interested in taking part?
- was their level of interest high, moderate or low?

Three hundred and fifty GPs responded, of whom 272 informed us that they were interested in the diploma in prescribing science at either the high or moderate level. All were established GP principals—trainees were not included.

I conclude that there is a considerable thirst for

scientific knowledge about prescribing, a thirst which, at a class size of 50 per annum, will take 5 years to quench in Northern Ireland. It seems likely that a

similar unfulfilled need exists throughout the UK. Who will fulfill it, if not our academic clinical pharmacologists?

Reference

McGavock, H. (1990). Promoting rational therapeutics. *Br. J. gen. Pract.*, **40**, 1–3.