A question of recruitment

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It is interesting to note that despite all the debate and controversy surrounding the Government's Health and Medicines Bill, relatively little has been said about the consequences for the professional recruitment of optometrists in the United Kingdom. It has been rumoured that admissions will rise, but this remains for the present speculation. In the meantime the writer tries to predict what may or may not happen

At present around 12 million people each year receive a free GOS sight test (or 'eye examination'), 88 per cent from optometrists. A survey of optometrists and ophthalmic medical practitioners (French, 1987b) revealed that in their professional opinion, considering matters such as a person's 'health, safety and happiness', the current consultation rate was quite inadequate and should be a great deal higher. OMPs were the most conservative in their judgements, but even their middle opinion on intervals between tests suggested a national need of 27 million eye examinations per year. However, it appears (despite the recent House of Lords reversal) that from April, 1989 the majority of people will be obliged to pay for a sight test, and the growth in primary vision care over the last 20 years is expected to be reversed with a substantial drop in testing. It may be some time before the present, inadequate levels are reached again. It has been suggested (Anon, 1988) that this drop will be a slump mirroring that occurring in 1950 when '...almost "free" spectacles finished. The charge for a single vision, 524 and torics, went from approximately Is 6d (7p) to about £ 1 8s 6d (£ 1.42), and the flow of patients almost ceased. Many small practices . . . were closed up. It also became almost impossible to get an optical job.'

The average growth in aggregate UK sight tests since 1965 has been around three per cent per annum, but in recent years it has accelerated to much higher growth levels and in the last quarter for which figures are available (that ending September 30, 1987) the annual rate of increase in England and Wales was six and a half per cent. Most recently growth has been boosted by public awareness of the coming changes and 'end' of free testing, although we may have to wait for the autumn for the House of Commons to confirm these.

Strength of the profession

The response by the training institutions has been to increase recruitment throughout the last 20 years. As a consequence, from 1980 to 1985 the average increase in Register strength was around one per cent. A questionnaire, addressed to optometrists in 1986 (French and French-Teeling, 1987) revealed that 58 per cent thought there were about the right number of optometrists, 34 per cent thought there were too few and 8 per cent thought there were too many.

Since then the strength of the profession has been calculated. It is currently around 79 per cent of the profession's registered numbers. The full-time equivalent optometrist of 1985-86 carried out 2,160 GOS sight tests per annum compared with their 1969 counterpart's 1,270. (This represents an annual increase in what might be loosely termed 'efficiency' of over three per cent.)

Recruitment numbers

Despite widespread pessimism regarding the future, institutions are still increasing their numbers (Table 1). The effective intake in October 1987 was 304 and in October 1988 if the applicants' examination results are sufficiently good there could be up to 320 admissions. Course entrants are being determined by the perceived capacities of the departments and needs of the institutions, rather than by any need of the profession.

If we assume 7 per cent of the intake are overseas, 55 per cent are women, and 9 per cent will fall by the wayside and fail to graduate and register, we can estimate the consequent increase in the profession's strength for various intakes using the model developed and validated in French (1987c). The predicted aggregate strengths and predicted annual percentage changes in strength are given in Tables 2 and 3. If an intake of 320 were to be maintained then the annual increases in the strength of the

Table 1: Nationality and sex of recent optometry degree admissions and expected year of Registration

	home			overseas			all		
	men	women	both	men	women	both	men	women	both
Year of registration									
1992								up to	*320*
1991	*134*	*154*	*288*	*8*	*8*	*16*	*142*	*162*	*304*
1990	*121*	*152*	*273*	*3*	*9*	*12*	*124*	*161*	*285*
1989	*103*	*169*	*272*	*6*	*18*	*24*	*109*	*187*	*296*
1988	*112*	*162*	*274*	*7*	*15*	*22*	*119*	*177*	*296*
1987	*128*	*136*	*264*	*13*	*11*	*24*	*141*	*147*	*288*

These figures are obtained direct from the departments. The 1992 figure is only a possibility. The actual figure will depend upon the quality of the applicant's exam results.

Table 2: Estimated strength of optometry profession — GOC Register in terms of Full Time Equivalent Optometrists

	Training institutions's annual admissions . . .							
	0	50	100	150	200	250	300	350
	Per cent change in admissions compared with 1987							
Year	−100	−83	−67	−50	−34	−17	0	+16
1986	5007	5007	5007	5007	5007	5007	5007	5007
1987	5090	5090	5090	5090	5090	5090	5090	5090
1988	5182	5182	5182	5182	5182	5182	5182	5182
1989	5277	5277	5277	5277	5277	5277	5277	5277
1990	5360	5360	5360	5360	5360	5360	5360	5360
1991	5461	5461	5461	5461	5461	5461	5461	5461
1992	5329	5368	5407	5446	5485	5524	5563	5601
1993	5199	5277	5355	5433	5511	5589	5667	5745
1994	5062	5179	5296	5413	5530	5647	5764	5881
1995	4934	5090	5246	5402	5558	5714	5870	6026
1996	4808	5003	5198	5393	5587	5782	5977	6172
1997	4686	4920	5153	5387	5620	5854	6087	6321
1998	4570	4841	5113	5385	5657	5928	6200	6472
1999	4467	4774	5082	5390	5698	6006	6314	6622
2000	4380	4722	5064	5406	5748	6090	6431	6773

This table assumes that 55 per cent of admissions are women and 7 per cent are from overseas. It also assumes a 9 per cent drop-out rate between course entry and GOC registration. The 1987 intake was 304. The admissions are for October 1988 onwards. Estimates are for the end of each year as is usual with GOC statistics.

Table 3: Estimated strength of optometry profession — annual per cent change in strength of GOC Register

	Training institutions' annual admissions . . .							
	0	50	100	150	200	250	300	350
	Per cent change in admissions compared with 1987							
Year	−100	−83	−67	−50	−34	−17	0	+16
1987	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7
1988	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8
1989	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8
1990	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
1991	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9
1992	−2.4	−1.7	−1.0	−0.3	0.4	1.2	1.9	2.6
1993	−2.4	−1.7	−1.0	−0.2	0.5	1.2	1.9	2.6
1994	−2.6	−1.9	−1.1	−0.4	0.3	1.0	1.7	2.4
1995	−2.5	−1.7	−0.9	−0.2	0.5	1.2	1.8	2.5
1996	−2.6	−1.7	−0.9	−0.2	0.5	1.2	1.8	2.4
1997	−2.5	−1.7	−0.9	−0.1	0.6	1.2	1.8	2.4
1998	−2.5	−1.6	−0.8	−0.0	0.7	1.3	1.9	2.4
1999	−2.3	−1.4	−0.6	0.1	0.7	1.3	1.8	2.3
2000	−1.9	−1.1	−0.4	0.3	0.9	1.4	1.9	2.3

This table assumes that 55 per cent of admissions are women and 7 per cent are from overseas. It also assumes a 9 per cent drop-out rate between course entry and GOC registration. The 1987 intake was 304. The admissions are for October 1988 onwards. Estimates are for the end of each year as is usual with GOC statistics.

profession would shortly exceed two per cent.

Now, two per cent would not be adequate to keep pace with a long-term growth in UK sight testing of three per cent, although perhaps some allowance should be made for increasing efficiency which has itself been of the order of three per cent per annum. Growth in testing might have been expected to continue for some time, given the professional opinions on ideal sight testing levels (French, 1988). However, it might be sensible to make a conservative projection of demand — particularly in the light of the changes. If there is to be (say) a seven per cent drop in demand followed by an annual one per cent growth for seven years, the profession's strength will in the meantime have grown by 13 per cent! In fact, if every training department in the country was closed down immediately it would have no effect for four years and the profession's strength in that time would still grow by 7 per cent.

If it was decided that the profession wanted one per cent growth in four years' time then admissions would need to be reduced to 235 per annum — a cut of around a quarter. If it wanted zero growth then numbers would need to be reduced to 165 — a cut approaching one half. One per cent growth could be achieved by closing down one large department (in Birmingham or London) or closing down two small departments (in Bradford, Cardiff, Glasgow or Manchester). Zero growth would be met by the closing of three departments.

This might be the way that the present University Grants Committee would approach the exercise based upon their approach to other subject areas, although in 1988 as a result of the Education Reform Bill the UGC will cease to exist and be replaced by the Universities Funding Council. Government policy favours large departments and a degree of rationalisation, as has been shown in recent years, for example, by their approaches to dentistry and veterinary science.

A significant change in Register strength could also be achieved by the introduction of mandatory retirement at age 65. At a stroke this would produce a 3.8 per cent reduction. Thereafter, the annual growth would not change a great deal from that described in Table 3. For an admissions total of 300, growth would typically be 0.3 per cent higher than the figures given in Table 3.

Of course it could be argued that all this doom and gloom is completely unnecessary and there is no need for any cuts. In fact if you wanted to increase the growth in the profession to three per cent then you would have to increase admissions to 385 per annum. A recent report suggested that recruitment levels in Australia were about right and there a full-time optometrist does only 1,200 tests per annum (Southgate, Guest and Johnston, 1988) — not much more than half the UK level. On the other hand it may be easier for a profession to increase its rate of testing than decrease it.

Australian optometrists have been steadily increasing their share of primary eye care by two per cent per annum for over 10 years, and their case load has increased by 11 per cent per annum since it was 870 per full-time equivalent optometrist just three years ago. Also the scope for growth may be greater in Australia where there are currently 15 sight tests for 100 population (Johnston, South-gate and Guest, 1988) compared with the United Kingdom's 21.

In the UK an optometrist is paid £10 for a GOS sight test for which on average they set aside 25 minutes (French, 1987a). In Australia they are paid $41.50 for a standard initial consultation (called an item 180 and usually taking around 30 minutes) and, $20.50 for subsequent consultations (items 182 and 184). At current exchange rates these are equivalent to £19.50 and £9.70. Dispensing accounts for around two-thirds of an optometrist's income (Southgate, 1988).

At the time of writing (July), there is controversy in dentistry. Successive reviews have suggested cuts in UK recruitment but it is only recently that the bull has been taken by the horns and a 10 per cent cut in admissions has been ordered. Government policy is that large units are more efficient. As a consequence they have not spread the reductions evenly but have called for the closure of two departments. Some dentists feel this is too little, too late and point to the World Health Organisation among others who feel that there should be a 70 per cent reduction in dental manpower in Europe in the next 40 years and a 50 per cent cut in dental recruits over the next 10 to 15 years. As a consequence of this and theirs being one of the courses threatened, University College London has argued that the UK cuts should be 50 per cent (not 10 per cent) and that they should be evenly spread (Williams and Wojtas, 1988).

Despite the fact that most optometry departments are a great deal smaller than those in dentistry which have been marked out for closure, my personal opinion is that // there are to be cuts in optometry then they, too, should be relatively evenly spread with perhaps greater cuts where there have been recent increases, but with no department closures. There are only six departments in the UK and it is important that a degree of variety in the approach to optometric education should be maintained.

Although a drop in demand is expected, in contrast to dentistry this does not reflect any fundamental change at present in the need for optometric services. Still, even in dentistry one can point to needs which are not being

met and which if realised would nullify projected drops in demand. The BDA (1985) reported that in the United States while 49.5 million hours per year of periodontal and preventive care were being provided, a further 127 million hours of need was going unmet. They thought similar 'startling' figures ought to be demonstrable within the UK. It may be such untapped needs which have led the UGC to be relatively conservative in its cuts policy. But translating need into demand is an uncertain business and many dentists feel it is unrealistic to depend too much on such radical departures from present practice.

Population changes

In dentistry, the major problem is one connected with age changes in the population — a new, younger generation is growing for which dental decay is much less frequent. At the other end of the scale, increases in the numbers of elderly have been triggered by two factors — the post-war baby boom and increased longevity. It is sometimes suggested that this increase will mean more work for health care professionals. This is undoubtedly true, but its effect in the case of optometrists is easily exaggerated (French, 1988): Trench and Loran assumed that population growth (at 0.2 per cent per annum) would continue after the year 2000 and contribute in a small way towards an increase in demand. Even this small increase is now in doubt. The 1985-based OPCS projections for England and Wales tentatively indicate a rate of population increase which averages out at only 0.1 per cent a year over the first quarter of the next century. Within this, people of pensionable age are projected to increase in number at the rapid rate of one per cent a year. The elderly require more eye care than the rest of the population, but like the very young they will remain minorities and the implications may not be as great as they may first appear.'

In 1987, people of pensionable age were projected to constitute 19.7 per cent of the population. It would be possible to use the figures in French (1987b) to calculate the exact percentage of the ideal optometric workload each age group would represent, but the present state of affairs is probably more pertinent. Unfortunately, there is little data on the elderly's present clinical proportions in the UK. A small study (French, 1985) suggested that 'retired' people represent around a quarter of optometrists' patients.

Thus, a one per cent annual increase in people of pensionable age would imply a quarter per cent increase in sight test workload. But-those below retirement age are projected to decrease at 0.08 per cent per annum and therefore might be expected to produce a 0.06 per cent decrease in sight test work load. In other words, altogether we are looking at a meagre 0.19 per cent per annum net increase due to projected population changes and people "living longer. (As an aside, it may also be worth noting the position regarding domiciliaries as these are likely to figure in any changes. French (1987c) suggested that at present they amount to 140,000 domiciliaries per annum — *ca.* one per cent of the UK GOS sight test total but not all amongst the elderly. I understand that Roger Ackerley and Andrew King's important Glasgow study may put this figure a little higher at around 180,000.)

Future optometric practice

Of course, increased need from the elderly does not exhaust the possibilities when it comes to an expansion in demand. Obviously, optometrists are involved in other activities than sight testing, but it is difficult to see very substantial annual growth in dispensing, contact lenses and so on to compensate in the present circumstances. More optimistically, growth may continue amongst the third of the population eligible for free tests and it is conceivable that this might contribute an aggregate one per cent per annum to growth... perhaps more.

Other arguments should not be neglected. There will be those who welcome an increase in recruitment and the consequent competition for jobs. It would mean cheaper labour— optometrists would earn less — and cheaper spectacles. Others will argue that there will be a need for more vision scientists — that not all optometry graduates should become optometrists. This argument is not new but runs completely counter to past history where very, very few graduates turn to professions other than optometry. It remains plausible if somewhat speculative.

There are people who saw the GOS sight test as something of a straight-jacket and welcome the changes as an opportunity for the profession to expand its role. There will be the 'fuller eye examination' as well as the 'standard sight test' (presumably equivalent to today's GOS), and the opportunity to offer a greater variety of services to the general public. Thus, they would argue that this could permit substantial growth in demand.

Obviously, none of us can really know exactly how things are going to develop. Surely everyone would agree that the profession should look forward rather than back.'… it is difficult to see much of the long-term future for any widespread continuance of primarily "refract and dispense" optometry' (Charman, 1984). '. . . the teaching institutions must provide a diversification of interests, techniques and expertise. Failure to do this places the entire profession at risk' (Harding, 1984). 'We need ways of increasing the percentage of optometrists' income from other professional services. At present a high percentage of optometry income is non-NHS; private dispensing and contact lens practice are examples. . . . Ought we not to be in the position to say to our patients that we would recommend certain other procedures in their particular case . . . at an additional charge' (Pickwell, 1986). Offering further services, then, *ought* to in itself provide a growth in optometrists' workloads, but 'ought' is not the same as 'will'. The problem for the profession is distinguishing between 'hype' and exaggeration on the one hand, and realistic, futuristic thinking on the other. Examples of activities which have been suggested as possible growth areas include orthoptics, low vision aids, occupational visual welfare, and vision screening of children. These will all require strenuous professional 'encouragement' at all levels, otherwise growth will not occur.

Conclusion

Optometrists should be asking themselves the question 'Do I want growth or contraction in the profession's registered strength?' If the profession can successfully weather the first year of the expected changes there ought to be the prospect of modest growth in demand for optometric services after that, but in my opinion further growth in admissions to training courses should be halted at present. Although the degree of cuts (if any) which are appropriate is debatable. I personally feel the position on expansion is much clearer — departments should not be increasing their numbers at this time. I believe that such behaviour is selfish and against the interests of the profession. It is understandable, because it is usually done to increase the viability of a department or institution, but in my opinion departments should be cautious and wait and see. Also, if the expected changes do occur, serious consideration should be given to mandatory retirement at age 65.

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