

Guest Editorial

The complete denture crisis: a personal view*

Edentulous patients are amputees just as surely as those who have lost limbs. It is a great credit to the dental profession and the stoicism of the patients that so many make light of this disfiguring and disabling condition. Our ability to offer treatment to edentulous patients has in this sense been such a success story that it has been taken for granted and undervalued by politicians, health service administrators and increasingly by the leaders of the profession particularly those involved in education and curriculum planning.

Osseointegrated implants have offered a great advance in oral rehabilitation, particularly for the edentulous, but relatively few patients have benefited from them. There are many reasons why patients do not have implants including medical, biological and economic. Indeed relatively few are offered implants and of those a number choose not to have them because they don't want to undertake the surgery involved or the prolonged treatment.

The most economical strategy for the edentulous would be to use implant supported overdentures. Even those patients who are able to have implants to support their lower dentures need access to clinicians capable of constructing complete dentures. These patients need well made prostheses which then use the extra retention, support and stability gained from the implants to bring positive benefits to the patient. A very real challenge for the foreseeable future, however, will be treatment of those edentulous patients who are not able to have or don't want implants.

Three groups of practitioners will need to be able to contribute to provision of this care – General Dental Practitioners, Specialists and Clinical Dental Technicians. Unfortunately, inadequate manpower planning and training regimes may lead to unsatisfactory delivery of care in future.

The question "how many edentulous patients will there be in future?" is a difficult one. In USA¹ although the percentage of edentulous people in any age cohort has reduced, the increasing mean age of the population means that the actual number of edentulous people is perceived to stay the same or even rise slightly. The view that the situation in Europe would be the same as USA has recently been challenged with the prediction that the number of edentulous patients in the UK will reduce by 50–60% over the next 20 years², again a fall that is less than previously predicted. Two other phenomena need to be taken into account. Firstly, the unknown effect of waves of immigration, both legal and illegal. No dental public health statistics are available for these groups, many

of whom may need access to the complete denture market. Secondly, we are experiencing unprecedented pressure from a consumer lead society. Those who become edentulous from a generation used to modern consumerism will not expect a set of dentures to last for ten, fifteen or even twenty years and even more importantly they will have higher expectations and will expect a better minimal standard of care. They will not (and should not) be as stoical or as accepting of the edentulous state as the post second world war cohort of edentulous patients. Furthermore, everyday experience cautions against investing too heavily in the predictions of falling numbers. For example in the early eighties, based on predictions, three UK dental schools were closed. The result is a shortage of dentists in UK, which is only manageable because about half of the population does not seek regular dental care and a large number of overseas trained dentists have come to UK.

We do not know how many dentures are provided annually at present. Nor do we know what is the ratio between dentures provided by national health care services, dentures made privately by registered dentists and those made illegally by unregistered practitioners. On balance it would be a mistake to over emphasise the reduction in numbers of dentures required in future. Mojon, *et al.*² stated that a reduction in patient numbers would have implications for undergraduate teaching, but they did not go into the details of what these implications would be. Half as many patients does not mean that each student can be taught half as much.

The United Kingdom General Dental Council's (GDC) consultation draft of the second edition of 'The First Five Years The undergraduate curriculum'³ removed removable prosthodontics from the competence section and left it open to dental schools not to teach enough to ensure that graduates were competent. Fortunately, after a series of very strong responses the final version of the second edition of 'The First Five Years'⁴ restored removable prosthodontics to the competence section. However, one may feel that the writing is on the wall and there is a danger that it will only be honoured in the breach. Most dental schools no longer have a separate examination in removable prosthodontics and as such students are only at risk of being examined in the context of a restorative dentistry paper and case presentation. This is a very easy risk to manage!

The standards for complete denture construction published by the British Society for the Study of Prosthetic Dentistry (BSSPD)⁵ remain unchallenged as the benchmark for clinical acceptability in UK. In the absence of any other standard, it seems to be indisputable that as a minimum, students should have sufficient clinical experience of the stages outlined in the BSSPD guidelines to enable them to achieve a level of expertise commensurate with treating the type of patient who can

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manage dentures. In UK we have already reached the stage where the removable prosthodontics curriculum has been pared to the bone and as a result new graduates may be inadequately trained. Vocational trainers have pointed to removable prosthodontics as one of the weakest areas for Vocational Dental Practitioner Trainees⁶.

Most clinicians who treat edentulous patients can divide these patients into two main groups: those who can manage dentures and those who have difficulty. In future the undergraduate curriculum should aim to equip graduates either to treat the first group properly or make an educated referral to a clinical dental technician. They should also be able to recognise the second group and refer for specialist care. The specialist must be trained to deliver that care⁷.

Postgraduate training has been shaped by the introduction of the specialist lists. Unlike most European countries, prosthodontics (fixed and removable) is a recognised specialty. However the fact that many institutional posts are managed under the restorative umbrella rather than specifically within prosthodontics may result in a reduction in interest in some areas, notably complete denture prosthodontics. Membership of BSSPD might indicate an interest in removable prosthodontics, yet only about half of those on the specialist list are members. Ten new specialists will be required per annum to maintain the current strength of specialists in prosthodontics. How the expertise will be shared between fixed and removable prosthodontics is unknown and there should be concern that expertise in complete denture prosthodontics will be lost. A reduction in expertise not only has consequences for patient treatment but also has implications for teaching. Wright⁸ pointed to a shortage of persons qualified for professorial posts in a number of dental specialties including removable prosthodontics. As a result, today's trainees are unlikely to get the same depth of training where complete dentures are concerned.

Clinical dental technicians (CDTs) are set to become a fact of life in UK as they are in some other European countries, even though enabling legislation is not likely to be enacted until 2006. It is important to understand that there will not be a grandfather clause that will allow any one who has done a denturist course abroad to register. Every one wishing to join this register will have to take a course and or at least pass a qualifying exam. Although the details of how this process may be able to be shortened are not yet known. A Clinical Dental Technicians Association already exists and claims a membership of over 100 who already have a Canadian qualification.

Only one UK dental school is thinking positively about training CDTs. The remainder seem unenthusiastic. This lack of enthusiasm is a mistake, particularly as applications from providers other than established dental schools to run courses would be entertained. It would be preferable that when clinical dental technician training courses become available they are in established schools so that the students can be taught by specialist prosthodontists alongside dental students as part of a dental team. Trainees must be taught the theoretical background to the subject. CDTs trained and working in the European Union will also be able to apply for registration in UK. We

might predict that there will be an influx as there have been of dentists.

In time patients could benefit as there will be greater choice and opportunities for treatment will improve. Once registered, clinical dental technicians will be able to work independently, in dental practices and in the community dental services. If they work independently they will have to work to a prescription from a dentist. In other words their patients will have to be referred by registered dentists. They will not be able to accept patients "off the street". This will require discipline and inspection. Furthermore, they will require the same sort of clinical facilities as a dentist. They will need less instrumentation as they will not be undertaking the broad range of treatment provided by a dentist, but they will need proper infection control procedures and medical emergency equipment. They will have similar overheads to dentists and so this will limit the financial attraction and perhaps we can expect comparatively fewer CDTs than was initially thought. Perhaps some larger practices may find work for some, and presumably those areas of the community service where a complete denture service is provided may also seek to employ CDTs. Introduction of clinical dental technicians will require a number of supporting measures such as patient education, clinical dental technician education, education of the referring dental profession and inspection and policing of the system.

A realistic estimate of the numbers of complete denture patients expected in future must be made and generally agreed by politicians, administrators and within the dental profession. Based on these numbers training programmes for dental undergraduates, specialists and clinical dental technicians need to be devised which will enable general dental practitioners and clinical dental technicians to treat those people who can manage dentures; will enable general dental practitioners to make informed referrals to clinical dental technicians and specialists. Specialist training must equip specialists to treat the more difficult cases.

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References

1. Douglas, C.W., Shih, A. and Ostry, L. Will there be a need for complete dentures in the United States in 2020? *J. Prosthet. Dent.*, 2002; **87**:5–8.
2. Mojon, P., Thomason, J.M. and Walls, W.G. The impact of falling rates of edentulism. *Int. J. Prosthodont.*, 2004; **17**:434–437.
3. General Dental Council. *The First Five Years The Undergraduate Curriculum*. Consultation document. London: General Dental Council, 2001.
4. General Dental Council. *The First Five Years The Undergraduate Curriculum*. London: General Dental Council, 2002.
5. The British Society for the Study of Prosthetic Dentistry. *Guidelines in Prosthetic Dentistry and Implantology*. London: Quintessence, 1996.
6. Cabot, L. *The dental vocational training experience: a transition from novice dentist to competent practitioner*. D.Ed, Open University, UK 2004 p84.
7. Clark, R.K.F. The future of teaching of complete denture construction to undergraduates. *Br. Dent. J.*, 2002; **193**:13–14.
8. Wright, P. Focus on Academic Dentistry. CDO Update, Department of Health, September 2004.