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Iris Cumainn Déadach na hÉireann

The legal status of teeth whitening

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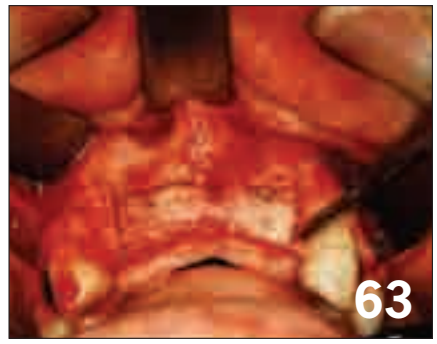

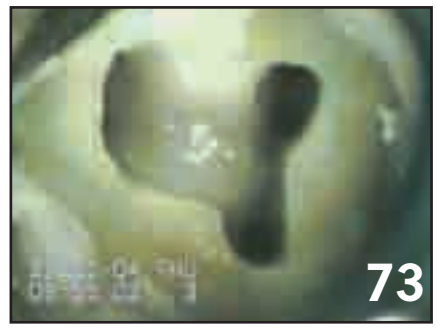

editorial

All change

I recently spent several hours with a number of our colleagues at a workshop in PricewaterhouseCoopers (PWC) brainstorming on issues related to the IDA. The IDA recently appointed PWC to carry out an organisational review of the Association with the view to reviewing current structures and practices and establishing how to most efficiently deal with the ever changing demands on our members. We were broken up into three groups and asked to discuss different but similar issues. What was most interesting was that each group raised almost identical concerns, problems and solutions.

I await the final report and recommendations with interest and believe time will generate some interest among the membership.

The IDA is facing many changes in the near future including its welcome relocation to larger and better-designed offices in the Leopardstown Office Park. The premises are currently in the process of being renovated and it is anticipated that the IDA HQ will move to its new location during August/September.

The settlement of the Competition's Authority case against the IDA on agreed terms has received mostly positive comments. One of the most important aspects of the case is the resounding endorsement of the IDA's constitutional rights to freedom of expression in permitting it to advise its members on matters of interest and concern. Frankly, it is difficult for me to see how a court could decide matter any other way.

On the public relations side, I am delighted to see that the IDA has already selected a public relations firm to proactively promote our profession. This issue was first raised at the AGM last December and the relevant subcommittee should be complimented on the way it went through the process of tendering and then appointing a firm.

I would hope that high on the action item list for the public relations firm will be to immediately tackle the issue of changing water fluoridation levels and fluorosis that is frequently reported in the media these days. The expert group on fluoridation was established by the former Minister for Health and Children, Mr Micheál Martin, to independently review the fluoridation of public piped water supplies and made some very strong recommendations in 2002 to amend the Fluoridation of Water Supplies Regulations, 1965 to redefine the optimal levels of fluoride in drinking water to less than the current level (0.8- 1ppm). It is extremely important that the IDA continues to put pressure on the Department of Health and Children to immediately implement the recommendations of the expert group which recommended a redefining of the optimal level to 0.6-0.8ppm with a target of 0.7ppm but not the abolition of fluoride altogether. Regardless of the vacancies in the Chief Dental Officers office, it is simply not acceptable to leave these valid recommendations that genuinely adversely affect patients sidelined.

Finally, there will be changes at the helm of the Journal over the next two issues. My tenure as editor is drawing to a close and I will not be pursuing a second term. It has been a thoroughly enjoyable experience and if I had a little more time and less family commitments I would be very reluctant to stepdown. However, that is not the case and as you will learn in the next edition, I can rest assured that the Journal will be in very safe hands.

Aisling O'Mahony
Editor

IDA reaches agreement with Competition Authority

The Irish Dental Association and the Competition Authority have reached an out of court agreement following an attempt by the Competition Authority to seek an injunction restraining the Association from advising or recommending members not to complete the VHI/DeCare claim form.

The Authority believed that the Association had acted inappropriately by offering certain advice to dentists in relation to the completion of VHI/DeCare insurance claim forms. The Association vigorously contested the accusations.

Following the issue of the proceedings, a full defence was entered by the IDA. The Authority then applied for an injunction against the Association, which was successfully resisted.

The Association argued that it did not accept that the allegations made by the Authority, or that the matters complained of were so serious as to warrant an injunction application. During that hearing, the IDA also successfully argued that the warrant used in the raid was not valid.

In addition, the Association secured a significant concession from the Authority when it acknowledged that the IDA did have constitutional rights of association, representation and freedom of speech. This has a major legal significance for the Association, and for similar bodies, for the future.

It should be noted that, several weeks following the raid, the Competition Authority had written to the IDA demanding that it and individual members of the Association's GP Group acknowledge, both to the IDA members and to the Authority, that they had breached part of the Competition Act and the EU Competition Treaty. If such an acknowledgment had been given it would have been an admission to the commission of a criminal and civil offence. As such, any party who had suffered loss as a result of the alleged civil wrong would have had a right of action against the Association for any damages resulting from that civil offence.

As a result of the negotiated settlement, this demand by the Authority was withdrawn.

In addition, the Authority had also demanded that the IDA and individual members of the GP Group undertake to desist from advising practitioner members of the Association not to complete the VHI/DeCare claim form or to engage in other activity with the object or effect of preventing dental health insurers from entering the Irish market.

While the agreed terms provide that the Association acknowledges the individual rights of practitioner members to make up their own minds on the issue - something the Association always acknowledged - and also provide that the IDA agrees not to instruct individual dentists not to cooperate, it does not preclude the Association from advising its members as to the implications of any particular course of action provided this does not breach competition law.

The IDA believes that this is a significant climb down by the Authority from its original demand.

With these significant concessions, it was felt prudent to enter into an agreement with the Authority that would settle any outstanding areas. These are:

- That the Irish Dental Association is happy to acknowledge and agrees to confirm to its members in writing within 28 days that it is for individual dentists to manage their own commercial affairs on an individual basis with regard to dealings with VHI DeCare or similar dental insurance providers, and that this supersedes any previous communication by the Irish Dental Association on this issue.
- That the Irish Dental Association agrees that it will not issue any communication to its members that instructs individual dentists to adopt a policy of non-cooperation with VHI DeCare or other private dental insurance providers in breach of competition law.
- That this will be made a rule of court with liberty to both parties to re-enter the present proceedings and/or to apply in respect of the aforesaid ruling.
- And, finally that each party will bear its own costs in relation to these proceedings.

Official showcase website goes live

The official website for International Dental Showcase 2005 - www.dentalshowcase.com - is now live.

The site allows visitors to register in advance for complimentary tickets for the show, which takes place at the NEC, Birmingham, 6-8 October 2005, as well as view an up-to-date list of exhibitors, find out how to get to the exhibition and download a floorplan to help plan the visit to the exhibition.

Advance registration closes 30 September 2005. On the day registration: £10 per person.

Need for six-monthly check-ups questioned

The need for a check-up every six months is now being questioned after it was found that the oral health of the population in many countries has now improved. and that this, coupled with the fact that there is a scarcity of dentists and often a cost associated with visiting a dentist, means that there may no longer be a need for the traditional cehck-up twice every year.

Although dentists in many developed countries recommend check-ups at six-month intervals, there are no high quality data to support this recommendation.

Dental health is an important part of a person's overall health, and the early diagnosis of problems can make treatment much easier to perform. The oral health of the population in many countries has improved dramatically over the last three decades. This fact, coupled with the cost of check-ups and the scarcity of dentists, means that it is appropriate to question how often a person should be seen.

Reviewing the best available data led the Cochrane authors to conclude that there is not enough evidence to draw any conclusions regarding the potential effects, good or bad, of altering the recall interval between dental check-ups.

"There is insufficient evidence to support or refute the practice of encouraging patients to attend for dental check-ups at six-monthly intervals," says the review's lead author Dr Paul Beirne, of the University Dental School and Hospital, Wilton, Cork, Ireland.

The authors say that their work highlights the need for further research into this issue.

Review title: Beirne et al: Recall intervals for oral health in primary care patients, The Cochrane Database of Systematic Review 2005, Issue 2.

Tooth whitening – an update

Dr John Tiernan Assistant Dental Director of Dental Protection gives a timely update on tooth whitening products and their legal status in Ireland.

Tooth whitening products, which release Hydrogen Peroxide and are used for cosmetic purposes, are regulated as cosmetic products according to the definition of cosmetic products in Article 1 of the Council Directive 76/768/EEC in relation to Cosmetic Products. In Ireland the EU Directive is implemented via Statutory Instrument number 870 of 2004 European Communities (Cosmetic Product) Regulations 2004.

Currently the EU Directive relating to cosmetic products limits the amount of Hydrogen Peroxide in oral hygiene cosmetics to not more than 0.1% present or released. In 1999, the Scientific Committee on Consumer Products and Non-Food Products (SCCNFP) adopted a position in its plenary session that the content of tooth whitening products should not exceed 3.6% Hydrogen Peroxide and also that tooth whitening products containing more than 0.1% Hydrogen Peroxide should exclusively be administered under the supervision of a dentist. That supervision does not necessarily mean in-surgery but also referred to home-bleaching. This recommendation did not produce a change in the law in Ireland. There has been no change in the EU Law since 1999 although various governments within the European Union have supported a change. The effective legal position is that anyone who supplies, for cosmetic purposes, a product containing more than 0.1% hydrogen peroxide is in breach of the above regulations.

On March 15, 2005, the third plenary session of the Scientific Committee on Consumer Products (SCCP) adopted a new position. It is believed that this opens the way for tooth whitening products containing up to 6% Hydrogen Peroxide to be available through dentists but not direct to consumers. Following are the conclusions of the SCCP:

- The use of tooth whitening products up to 0.1% Hydrogen Peroxide is safe.
- The proper use of tooth whitening products containing between 0.1–6.0% Hydrogen Peroxide (or equivalent for Hydrogen Peroxide releasing substances) is considered safe after consultation with and approval of the consumers dentist.
- The use of tooth whitening products is not recommended prior to or immediately after dental restoration.

Particular care should be taken in using tooth whitening products by persons with gingivitis and other periodontal diseases or defective restorations. Conditions such as pre-existing oral tissue injury or

concurrent use of tobacco and/or alcohol may exacerbate the toxic effects of Hydrogen Peroxide.

There is an absence of good clinical data and long-term epidemiological studies that assess the possible adverse effects within the oral cavity.

The new additional data supplied does not provide the necessary reassurance in terms of risk assessment to support the safety of Hydrogen Peroxide up to 6.0% in tooth whitening products freely and directly available to the consumer in various application forms (strips, trays etc). SCCP cannot quantify the risk of potential serious adverse effects in relation to the use of tooth whitening products.

The current position in law effectively made the supply of these products illegal whether supplied in-surgery or as take-home kits. It is hoped now that the various members of the EU will introduce the necessary legal changes so as to enable these techniques to be used without fear of prosecution. It is important to note that even under current proposals the recommendation is only up to 6% release of Hydrogen Peroxide (18% Carbamide Peroxide) and therefore some of the higher strength Carbamide Peroxide preparations may still not fall within the law. The SCCP's decision not to recommend the free consumer access of tooth whitening products containing 6% or more Hydrogen Peroxide on the market is based on a technicality of a lack of clinical studies into the use of tooth whitening products, combined with the stated need for further study of long-term clinical data and epidemiological studies assessing any other adverse effects. Dental Protection's position remains that not withstanding the current legal situation which suggests that the supply of these products is currently illegal, dentists must always take into account what is in the best interests of patients.

There are various options open to a dentist placed in a position of whether to offer tooth whitening to a patient or not. Options include:

- Delay treatment until such time as there is a change in the legal status.
- Explain the situation fully to the patient so that the patient can decide whether to proceed with treatment or not.
- To provide alternative treatments, again with the patient fully understanding the risks and benefits.
- To proceed with tooth whitening techniques with an evidence base as to their efficacy.

Where a therapeutic decision is made to use a tooth whitening technique it should be fully discussed with the patient. Patients should be aware of the risks and benefits balancing the question mark of the legality of the supply of these products with the risks to these patients of the removal of healthy tooth structure if alternative treatments are used. Comprehensive clinical records should be taken of the consent process.

Reference:

Scientific Committee on Consumer Products Opinion on Hydrogen Peroxide

Dr Nico Droog

1954 – 2005

"He who has done his best for his own time, lives for all time" (Schiller)

It is with deep sadness and regret that I write of the untimely death of a dear friend and colleague, Dr Nico Droog.

Nico was born in Limerick in 1954, his parents having emigrated from the Netherlands in the post war years. Nico was educated at St. Philomena's Junior School and Crescent College Limerick. He graduated from University College Cork in 1977 and subsequently worked as an associate in practice in Kent. Nico married his colleague, Dr Elmar Murphy, in 1979 and both moved to the Netherlands where they worked in practice in The Hague. They returned to Limerick in 1982 both taking up appointments with the Mid Western Health Board.

Nico was a highly skilled clinician who was devoted to his patients. He was both fastidious and meticulous in his work. From the outset, he took a keen interest in the management of those patients with Special Needs. He delivered to them the highest possible standard of clinical care, with warmth and sincerity of heart. Nico's many years of tireless dedication to patients with special needs was formalised in 2001 by his appointment as Senior Dental Surgeon, Special Needs, to the Mid Western Health Board.

On a personal level, Nico was a man who possessed many fine qualities. His kind, gentle and unassuming manner and his good natured humour endeared him to those who knew him. Nico had a warm and vibrant personality and possessed a great energy and enthusiasm for life. Although a private person by nature, Nico was someone who loved to engage in animated conversation, often, as those of us who knew him well will fondly recall, taking a highly circuitous route in making his point or recounting his tale. He was a loyal and wonderful friend and a true gentleman.

As a colleague, Nico was strong in principle and true to his convictions. He treated all equally. He had a deep respect for others and he, in turn, gained the respect of those who knew him.

Nico was an active member of the Association, and, with his keen intellect and enquiring mind, was particularly interested in Continuing Professional Development. As late as last October, Nico attended the Health Board Dental Surgeons' Conference in Connemara.

Family was Nico's greatest priority in life. He was devoted to his beloved 'Ellie'. He dearly cherished and adored his three beautiful children, Elsa, Laura and Stephen, following their every step on the great pavement of life with pride, vigour and enthusiasm.

Nico's interests were varied but perhaps reflecting his Dutch heritage, his greatest passion was for gardening. His beautiful garden, with its manicured lawns, perfectly trimmed hedges and geometric borders, is testimony to the precision which Nico applied to everything that he did.

Nico was a proud and dignified man who had a tremendous strength of faith. On receiving the news of his illness, he responded with grace and courage never for a moment displaying any element of bitterness or self pity. He fought a valiant battle, against all odds, to retain the life which he held so dear. Nico's beloved Elmar was his rock throughout his illness. Sadly, Nico gently slipped away from us on March 16.

The esteem in which Nico was held was reflected in the very large numbers who attended both his Removal and his Requiem Mass. It was particularly poignant that Nico was laid to rest on March 19, his fifty-first birthday.

To have known Nico as a colleague and to have worked with him has been a great pleasure, but to have known him as a friend has been a profound privilege.

May the Lord comfort and bless Elmar and the children, Nico's mother Anna, brothers Harry and Hans, sisters Klara and Annjo and his extended family.

Ar dheis Dé go raibh a anam dílís.
Moge hÿ rusten in vrede.

Caroline Mullane
Limerick

Counterfeit warning

Dentsply has issued a warning that there are counterfeit Spectrum TPH products being distributed throughout Europe.
The counterfeit products (Shade A3, LOT 0406000884 compule tips labelled with 02334; Shade A2, LOT 0405001389 compule tips labelled with 00260; and, Shade B2, LOT 0404000626 labelled with 02339) have never been manufactured by Dentsply. There is a risk to using counterfeit compule tips where the housing may fracture leading to possible injury to user and/or patient. Selling or using these counterfeit tips does therefore present potentially significant risks to patients and liability to the seller.
Dentists are advised to check their stock immediately for the LOT numbers noted above. In addition, a counterfeit spectrum can be identified by the following:

- The printing of the word 'spectrum' is missing on the compule tip housing; and,
- On the bottom, it is missing the LOT number on the retaining ring.

If you do identify or have a suspicion that you may have counterfeit products, you should quarantine them and contact Mike Hodgkiss on 0044-1752-237617.

Agents sought

The Barth Corporation of France has launched the Lyre-Jet a new development in the prevention of dental cavities and periodontal disease.
The Barth Corporation is currently looking for agents, importers and resellers for this new product.
Lyre-Jet offers a unique mechanical-hydraulic system which uses a simultaneous triple action that combines the power of dental floss, a double pulsating water spray and vibrations to clean the areas between teeth. The flossing action loosens plaque, tartar and bacteria while the water spray rinses them away.
For further information, go to: www.lyrejet.com

Denture guarantee

Ivoclar Vivadent is now offering a three year guarantee for its Ivostar and Gnathostar teeth.
Ivostar and Gnathostar teeth are available in all 16 A-D shades with 26 newly developed moulds. They feature harmonised layering to reproduce the natural appearance of the original tooth and a choice of triangular, square or oval moulds. The guarantee covers the teeth against excessive wear for three years from the date of fitting.
When presenting patients with their dentures, the dentist provides the patient with a guarantee card that contains all the information they would need in the event of a claim. The patient simply sends the registration portion to Ivoclar and retains the rest as a reference.

BFR Listerine meetings

Dr Burgess presented findings of a recent clinical study demonstrating that a BFR regimen reduces plaque and gingivitis entitled "Efficacy of a Brush, Floss, Rinse regimen: adjunctive benefit of an essential oil containing mouth rinse in reducing plaque and gingivitis in patients who brush and floss regularly".
Listerine is sponsoring three more regional BFR meetings throughout the country over the coming months.

Maura Haran and Dr Paul Burgess with Dr Maeve O'Flynn of the Kilkenny Regional Branch of the IDA at the first of four BFR (brush, floss, rinse) meetings being held with regional branches of the Association.

Leading fluoride protector

Fluor Protector is suitable for use with small children and adults and is a painless treatment that is colourless, aesthetic and quick setting.

Fluor Protector, Europe's leading fluoride protector from Ivoclar Vivadent, is now available here. It shields against caries. It can also repair initial caries lesions.
Supplied in single dose bottles or ampoules, Fluor Protector can be applied quickly and economically.

Mouthguards

DB Orthodontics Limited has announced the availability of its universal Defender mouthguards, which are shaped so that the tongue fits comfortably between the bite pads, with an innovative three vent opening which is positioned for optimum airflow and tongue protection. Supplied in packs of 10 each Defender mouthguard comes in a DBO retainer box.

Automix syringes from Multilink

Multilink is now available in automix syringes.

Multilink, the universal luting composite from Ivoclar Vivadent is now also available in automix syringes.

The tip on the syringe mixes the two components to create a blend with optimised chemical and physical properties. The dentist benefits from not having to manually mix the components. In addition, no other equipment (capsule, mixer, etc) is required and the luting material can be directly dispensed onto the restoration.

Multilink Automix is a self-curing luting composite that can be optionally light-cured. Designed to compliment Variolink II, it has been specially developed for clinical situations in which light-curing is difficult or impossible. It is recommended for indirect restorations made of all types of restorative materials, particularly situations in which a strong bond, tight marginal seal and minimal postoperative sensitivity is desired. It is bonded using self-etching and self-curing Multilink Primer A/B, which acts as a sealant and provides good marginal adaptation and high bond strength.

Multilink Automix is supplied in yellow, transparent and opaque shades. Each is available in a System Pack containing a 9g syringe of the appropriate shade, Primer A/B (2x3g bottles), 5g Metal Primer and various accessories, all of which are available as separate refills.

Maxillary alveolar ridge augmentation using distraction osteogenesis: a literature review and case report

The restoration of the edentulous atrophic anterior maxillary ridge has proved difficult. The absence of both gingival and bony alveolar tissue contributes to these problems. Numerous techniques to address these issues have been described.
We report a case of a patient who sustained multiple facial injuries as a consequence of an accident, including the loss of the maxillary incisor teeth and associated alveolus. This patient underwent fixed implant supported prosthetic rehabilitation, following the use of distraction osteogenesis in the reconstruction of the edentulous atrophic anterior maxillary ridge.

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Introduction

Restoration of the atrophic ridge in the maxillary aesthetic zone in the partially dentate patient remains a difficult challenge for the restorative dentist. Traditionally, this problem has been managed using a removable partial denture with an extended acrylic flange to replace the missing bone, soft tissue and teeth. As expectations evolve, clinicians and patients frequently pursue the option of fixed restorations in these cases. The absence of adequate alveolar bone and concurrent loss of soft tissue provides aesthetic and functional challenges for fixed restorations and may preclude the use of implant retained prostheses. These restorative difficulties have resulted in an increasing clinical interest in reconstruction of the atrophic maxillary anterior alveolar ridge.[1-9]

Numerous reconstructive and regenerative techniques have been advocated to augment the alveolar ridge including:

- Guided bone regeneration (GBR)[1]
- Autogenous bone grafting[2,3]
- Distraction osteogenesis.[4-9]

GBR

GBR using particulate bone has been shown clinically and histologically to regenerate alveolar bone[1] and provide increased volume for implant placement. However, GBR may not provide the ridge height necessary for reconstruction following dentoalveolar trauma, where large vertical defects may be present in many cases.

Autogenous bone grafting

Donor site morbidity is unavoidable with autogenous bone grafting[2,10] and there may be unpredictable resorption of the graft during the months prior to implant placement.[11] Importantly, there may be insufficient gingival soft tissue present to accommodate a graft of suitable size and, where adequate volume is possible, reproducing the appearance of the alveolus is often difficult.

Distraction osteogenesis

Distraction osteogenesis (DO) may have a role in reconstruction of the anterior maxillary alveolus. DO is a technique of bone lengthening which uses the natural healing mechanism of the body to generate new bone. An osteotomy (corticotomy) is made in an area of bone deficiency and a fixation device which may be internal or external is used to slowly elongate the bone to its new dimension while natural ossification produces new bone at the site of distraction.[12] This technique provides the advantage of simultaneously increasing the volume of both alveolar bone and soft tissue available for subsequent restoration.

History of distraction osteogenesis

DO was originally described by surgeons in the late-1800s. The first published report of osteodistraction was from Codvilla, an Italian orthopaedic surgeon in 1905, where he described an osteotomy of the femur and the use of weights attached to the calcaneus to provide distraction. The elongation was stabilised by a plaster cast and resulted in problems of skin necrosis.[13] There were further reports of the technique

Case report

A 19-year-old man was brought to the accident and emergency department by ambulance with multiple facial injuries sustained when a cement block fell on his face while working on a building site. The patient was admitted under the care of Oral and Maxillofacial Surgery Service. Clinical examination, plain radiographic and computed tomographic imaging confirmed the presence of extensive facial fractures involving the mid face at Le Fort I and Le Fort II levels, communition of the right orbit involving both the orbital floor and medial wall, right mandibular condyle fracture and symphyseal fracture. The patient also had loss of the maxillary incisor teeth with communition of the maxillary alveolus. There were also extensive soft tissue injuries to the forehead. There were no intracranial or cervical spine injuries.

Following resuscitation and stabilisation, the patient was taken to the operating theatre five days following hospital admission. Under general anaesthetic with submental intubation he underwent open reduction and internal fixation (ORIF) of his facial fractures. The medial wall and floor of his right orbit were reconstructed with a bone graft harvested from the anterior wall of the maxillary antrum. The anterior maxillary alveolus was debrided and the retained fragments of the maxillary incisors removed. He had a satisfactory post-operative course and was discharged from hospital five days post-operatively.

An acrylic upper partial denture with labial flange extension was fabricated by the patient's dentist to replace his missing teeth and alveolar bone.

Following complete recovery from his injuries, the patient requested the construction of a fixed restoration. Therefore, in consultation with the patient's restorative dentist, alveolar ridge augmentation and fixed implant retained restorations were planned. Because of the severe anterior maxillary atrophy and concurrent absence of gingival soft tissue, it was planned to carry out anterior maxillary alveolar distraction and implant placement to permit the construction of a

of osteodistraction during the early 1900s, associated with numerous complications, leading to the judgement by Compere that the technique of distraction osteogenesis left patients "more crippled than before the operation".[14]

The contemporary era of distraction was pioneered by the Russian orthopaedic surgeon, GA Ilizarov. Ilizarov began his landmark work at the Hospital for War Invalides in Kurgan, Russia in 1949. Following World War II, numerous veterans in Siberia had difficulties with osteomyelitis and malunions from injuries suffered during the war. He used a primitive external fixation device to compress the injured bone ends. A patient accidentally reversed the direction of force thereby causing separation (distraction) instead of compression. Ilizarov observed new bone formation radiographically and pursued the idea experimentally and clinically.[15,16]

Although renowned in Russia, the Ilizarov technique was not popularised in North America until 1988, when Ilizarov presented his work at a symposium in New York.

Physiology of distraction osteogenesis

DO is a technique of applying stress to a surgically produced bone disruption thereby stretching the reparative callus and generating new bone. Following the osteotomy (corticotomy) haematoma formation occurs with the associated migration of inflammatory cells into the surgical site. Growth factors stimulate proliferation of osteoblasts. Collagen is laid down with the fibrils oriented along the axis of distraction. Mineralisation occurs after 10 to 14 days at the edge of the regenerate while a central zone of fibrous tissue is maintained until the distraction is complete when it is slowly replaced by bone.[17,18]

Applications of distraction osteogenesis to dentistry

DO has been described in oral and maxillofacial surgery as a technique for management of both craniofacial[17,19] and dentoalveolar abnormalities.[5,6] Block et al[4] reported successful alveolar ridge augmentation (ARA) using an intraoral distraction device in animal experiments. Chin and Toth[5] subsequently described DO for augmentation of alveolar ridge defects following traumatic loss of teeth in humans. Gaggl et al[6] have described a simplified technique for ARA using distraction implants which serve as the restorative implant following distraction. This requires only one operative procedure and may be used to augment alveolar segments as small

Figure 1a: Clinical photograph of maxillary ridge with anterior maxillary alveolar atrophy.

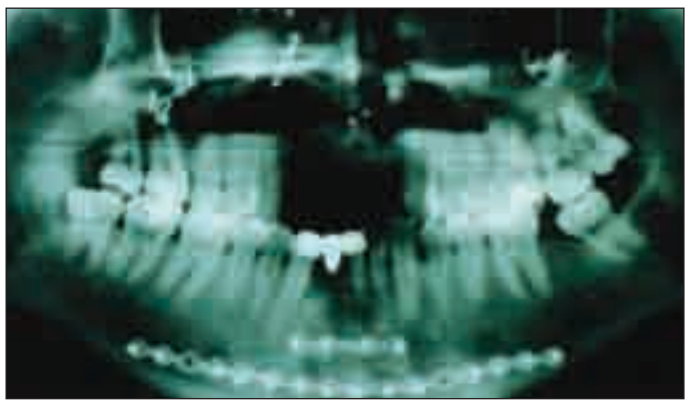

Figure 1b: Orthopantomograph prior to distraction note the internal fixation (bone plates) from previous facial injuries.

fixed prosthesis (Figure 1a, b).

Some months later, he returned to the operating theatre and underwent anterior maxillary osteotomy and placement of an intraoral distraction device (Track Plus System, KLS Martin) under general anaesthetic. A crestal incision was used and a three-sided osteotomy created. The palatal tissues were undisturbed to maintain the blood supply to the segment. The alveolar distractor was secured to the labial aspect of the remaining alveolar bone (Figure 2a, b). A tension-free gingival closure was possible following release of the periosteum and undermining of the labial mucoperiosteal flap. After a latency period of seven days, the maxillary segment was distracted at a rate of 0.5mm/day for 16 days. The ridge was thus increased in height by 8mm (Figure 3a, b). The patient's acrylic partial denture was adjusted and refitted as a space maintainer. The distractor was left in situ for 12 weeks to permit consolidation of the new bone.

Following the period of consolidation, the distractor was removed. Clinically, an adequate vertical height of alveolar bone and soft tissue was evident. However, there was inadequate volume of bone in a horizontal dimension to allow the placement of endosseous implants. A corticocancellous bone graft was harvested from the anterior iliac crest and used to augment the maxillary alveolus. The grafts were secured with multiple 1.2mm bone screws. The soft tissues were closed without tension, the distraction process facilitating the expansion of the soft tissue envelope. Following a healing period of four months, four endosseous implants were placed under general anaesthetic and second stage surgery was performed under local anaesthetic with intravenous sedation a further six months later. The implants have been restored and the patient has obtained a satisfactory the functional and cosmetic result (Figure 4 a, b).

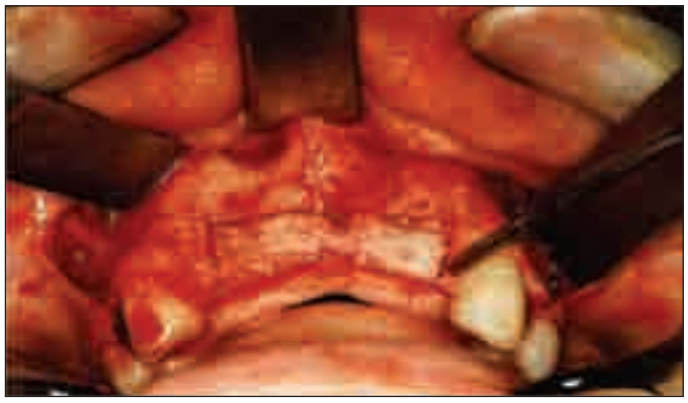

Figure 2a: Alveolar osteotomy.

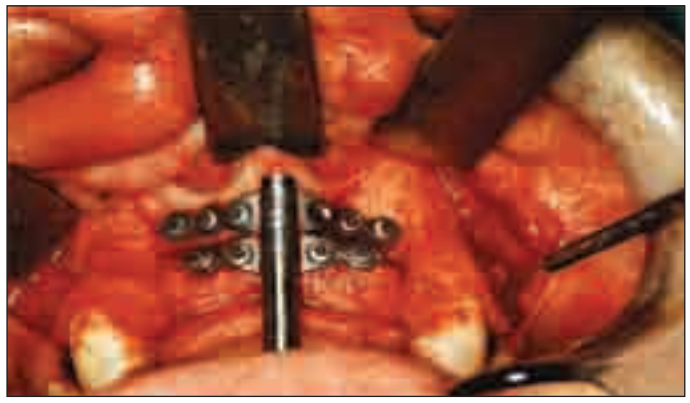

Figure 2b: Distractor in position.

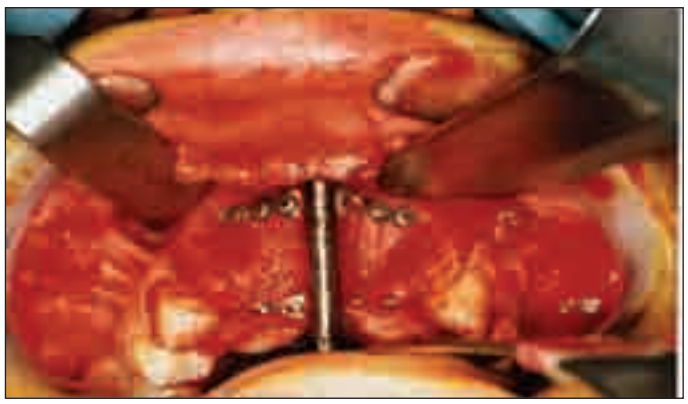

Figure 3a: Distractor extended prior to removal.

Figure 3b: Alveolar ridge with adequate alveolar height but inadequate width to support endosseous implants, following removal of distractor.

as a single tooth.

A case report of severe anterior maxillary alveolar atrophy following an extensive facial injury, managed by DO, bone grafting and subsequent implant placement to restore the maxillary anterior segment, is shown on pages 64-65.

Discussion

Surgical correction of the atrophic maxillary anterior alveolus is difficult because of the concurrent loss of bone and soft tissue. Autogenous bone grafting and guided bone regeneration are used but may fail to consistently provide sufficient bone for implant placement and satisfy the aesthetic demands, particularly related to the soft tissues. While GBR may be used to increase bone volume for implant placement, it does not provide adequate ridge height in many cases. In contrast, bone and soft tissue are distracted simultaneously in DO, while the original pre-distraction attached mucosa remains at the crest. The crestal bone is mature cortical bone and therefore less likely to resorb than grafted bone.[7] The new bone formed by distraction has also been shown in animal studies to have good long term stability.[18,20]

Clinically, the technique comprises three stages: latency, distraction, and consolidation.

A latency period of five to seven days[8], distraction rate of 0.5mm/day[18,20] and a consolidation period of eight to 12 weeks prior to implant placement is recommended by different authors. A latency period of five to seven days is left prior to commencement of distraction to allow for differentiation of the bone forming cells stimulated by the osteotomy and, more importantly, re-establishment of the blood supply disturbed during the operation to insert the distractor.[8] The rate of distraction is important, too fast a rate may result in a fibrous tissue bridge or cyst formation[7] conversely, a rate which is too slow may risk premature consolidation. A distraction rate of 0.5 to 1mm/day is recommended by most authors and has been confirmed in animal studies for both long bone and facial bones.[12,21,22] Meyer et al[21] contend that it is the magnitude and not frequency of mechanical loading that controls the rate of distraction regenerate. This is consistent with Aronson[12] but conflicts with research published by Ilizarov[16] showing that the daily frequency of distraction resulted in the optimum distraction regenerate.

A consolidation period of eight to 12 weeks after distraction is left to allow for bone mineralisation, before removal of the distractor and implant placement. The choice of 12 weeks in this case was based on the available evidence from previous studies.[12,14] Histological studies in sheep have demonstrated progressive mineralisation of regenerate bone over time to resemble non-distracted bone after one year.[18]

Previous studies have reported a number of complications associated with alveolar distraction osteogenesis including: fracture of the transport segment; difficulties in completing the osteotomy on the lingual side (mandibular alveolus); excessive length of threaded screw interfering with occlusion; incorrect direction of distraction; perforation of mucosa by the transport segment; suture dehiscence; bone formation defects; resorption of distracted segment; and, need for secondary bone grafting.[8,9,22]

In addition, success rates for implants placed in regenerate bone are lower than would be expected for normal bone.[8,9] In most cases the complications are minor and may be rectified by another procedure. In this case, while DO provided adequate ridge height and expansion of the soft tissues, the patient required subsequent grafting with autogenous bone harvested from the iliac crest as there was insufficient width for implant placement. This has been previously reported.[8,12,23] A horizontal deficit exists in more than half of cases with vertical deficit but the best method to deal with this is as yet not established. Bone grafting may be performed after distraction[8,12,22] as in this case or alternatively grafting to achieve width followed by distraction of the previously grafted bone at a later stage.[24] It may be possible in some cases to over distract vertically, past the horizontal defect and contour the alveolus at the time of implant placement.[8]

This case demonstates a possible role for DO in management of atrophic anterior maxillary alveolar defects. The advantages of DO over other reconstructive surgical modalities are the simultaneous elongation of soft and hard tissues.

As the technique is refined with improved control of the vector of distraction it may be possible to achieve a satisfactory gain in both vertical and horizontal bone volume in addition to the expansion of the gingival soft tissues, thus avoiding the need for secondary bone grafting and associated donor site morbidity.

Figure 4a: Clinical appearance following implant placement and restoration.

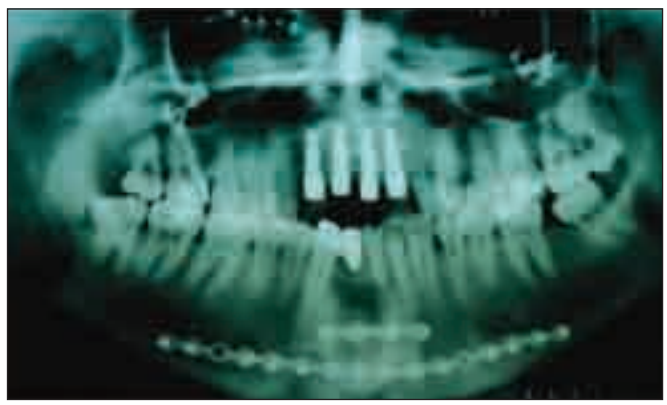

Figure 4b: Orthopantomograph following implant placement and restoration.

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A survey of undergraduate orthodontic training and orthodontic practices by general dental practitioners

Purpose of the study: to assess satisfaction with undergraduate orthodontic training, the variety of treatments undertaken in general practice, practitioners' perceived competence in orthodontics and the level of interest in continuing education in orthodontics.

Design: cross-sectional questionnaire-based study.

Materials and methods: a questionnaire was mailed to 520 general practitioners in Dublin, Kildare and Wicklow as listed in Irish Dental Council Register of Dentists 2003.

Results: forty-six per cent of dentists responded. More than half (54 per cent) of the respondents were satisfied with both academic and clinical aspects of undergraduate training. Twenty-nine per cent regularly perform orthodontic treatment. Only 60 per cent feel comfortable treating orthodontic emergencies. Over 70 per cent have either already attended or aspire to attend further training in orthodontic diagnosis and interceptive orthodontics.

Conclusions: our study indicates that in the greater Dublin area, graduates (those qualified less than 10 years) are increasingly satisfied with undergraduate teaching.
Orthodontic treatment is performed regularly in general dental practice with interceptive procedures most often carried out. While ability to deal with orthodontic emergencies is not universal, practitioners do appear confident to perform a variety of orthodontic procedures. Interest in continuing education in orthodontics is very high. Our study indicates that participation in continuing education in orthodontics appears to translate into greater provision of orthodontic care in general practice.

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Introduction

Undergraduate orthodontic training should prepare graduates adequately for work in general practice. Little evidence is available concerning the efficacy of undergraduate education in preparation of graduates for life as a qualified dental practitioner.[1] Kay and Blinkhorn (1987) in a questionnaire-based study exposed great dissatisfaction among recent graduates in relation to undergraduate orthodontic training with many graduates complaining that they had never actually treated an orthodontic case as an undergraduate.[2]

The General Dental Council in the United Kingdom (UK) gives guidance with respect to minimum standards expected of dental graduates in the UK. The General Dental Council in its *First Five Years* document (2002) has suggested that the new graduate should:

- Be competent at orthodontic assessment including indication of treatment need.
- Be competent at managing appropriately all forms of orthodontic emergency including referral where necessary.
- Be competent at making appropriate referral based on assessment.
- Have the knowledge to be able to explain and discuss treatment with patients and their parents.
- Have the knowledge to be able to design, insert and adjust space maintainers.
- Have the knowledge to design, insert and adjust active removable appliances to move a single tooth or correct crossbite.
- Be familiar with contemporary treatment techniques.[3]

Although this document refers to the situation in the UK, it has implications in a European context as significant advances towards convergence in standards of undergraduate education throughout Europe have been made in recent years.[4]

General dental practitioners have an influential role to play in management of orthodontic patients. Suggested responsibilities of general practitioners include diagnosis and assessment of orthodontic treatment need, supervision of the development of the dentition, interception of developing problems and specialist referral for advice and treatment where necessary.[5]

While general dental practitioners may

undertake advanced orthodontic cases, it has been demonstrated that qualified orthodontic specialists are more likely to achieve significantly better treatment outcomes than general dental practitioners with no orthodontic qualification.[6,7] Demand for orthodontic treatment is high and is expected to remain so for the foreseeable future.[8,9,10]

Purpose of the study

The purpose of this study was to determine:

- the degree of satisfaction of graduates with their undergraduate orthodontic training;
- the types of orthodontic treatment undertaken by general dental practitioners working in the public and private sectors and the patterns of referral;
- the self-perceived competence of general dental practitioners in orthodontics with special reference to "*The First Five Years*" (UK General Dental Council Framework); and,
- the level of interest in continuing dental education in orthodontics.

Materials and methods

A questionnaire was piloted on 20 clinicians from the Dublin Dental School and Hospital in May 2003. A modified questionnaire was mailed to 520 general dental practitioners, in private practice and in public service (health board), throughout Dublin, Kildare and Wicklow. These dentists were listed in the Irish Dental Council Register of Dentists 2003. Retired dentists, specialists and primarily hospital-based dentists were excluded from the sample.

The questionnaire had 32 questions, was uncoded and totally anonymous. All questions were 'closed' to ensure completion took no more than 10 minutes. Practitioners were encouraged to provide additional information to ensure the study would reveal their full range of opinions. Non-responders were not contacted. Data from completed questionnaires was entered into an Excel spreadsheet for analysis.

Results

There was a 46 per cent response rate. The main results are presented in Tables 1-8. The results reflect the views of dentists over a broad range of years post graduation (Table 1). Approximately 65 per cent of respondents were satisfied with the academic component of their undergraduate training in orthodontics, with only 55 per cent reporting satisfaction with the clinical component of the undergraduate orthodontic training (Table 2). Dentists that were qualified with less than 10 years reported greater satisfaction than those less recently qualified (Table 2).

Most respondents referred to specialist practices in orthodontics (75 per cent) with four per cent referring to a dental hospital, 18 per cent to health boards and five per cent to with a special interest in or))thodontics (Table 3).

Twenty-nine per cent of general dentists perform orthodontic treatment (Table 4).

Forty-eight per cent of respondents aspire to attend continuing dental education courses on interceptive orthodontics (Table 7).

Discussion

Previous studies have revealed great dissatisfaction among recent graduates in relation to undergraduate orthodontic training, with

Table 1: Number of years after graduation

Years after graduation	Number of replies	% of total replies
<10	72	30
10-20	77	33
>20	89	37
Total	238	100

Table 3: Pattern of referral

Place of referral	% Total	
Health Board	18	(n=43)
Dental Hospital	4	(n=10)
Specialist Practice	73	(n=173)
GDP with special interest in orthodontics	5	(n=12)

Table 2: Satisfaction with undergraduate orthodontic training

Group	<10 yrs qualified	10-20 yrs qualified	>20 yrs qualified	Total
Academic component of programme was adequate	78% (n=56)	51% (n=39)	62% (n=55)	63% (n=150)
Clinical component of programme was adequate	69% (n=50)	43% (n=33)	51% (n=45)	54% (n=128)

Table 4: Type of orthodontic work carried out

Group	<10 yrs qualified (%)	10-20 yrs qualified (%)	>20 yrs qualified (%)	% Total
Procedure	25 (n=18)	28 (n=21)	34 (n=30)	29 (n=69)
Timely removal of primary canines	7 (n=5)	17 (n=13)	17 (n=15)	14 (n=33)
Serial extractions	3 (n=2)	5 (n=4)	7 (n=6)	5 (n=12)
Correction of anterior crossbite	19 (n=14)	23 (n=18)	29 (n=26)	24 (n=58)
Maintenance of leeway space	15 (n=11)	10 (n=8)	19 (n=17)	15 (n=36)
Functional appliance therapy	6 (n=4)	5 (n=4)	15 (n=13)	9 (n=21)
Single arch fixed appliances	6 (n=4)	9 (n=7)	16 (n=14)	11 (n=25)
Two arch fixed appliances	4 (n=3)	8 (n=6)	16 (n=14)	10 (n=23)
Treatment of Class 1 cases	7 (n=5)	10 (n=8)	16 (n=14)	11 (n=27)
Treatment of Class 2 cases	3 (n=2)	5 (n=4)	13 (n=12)	8 (n=18)
Treatment of Class 3 cases	3 (n=2)	1 (n=1)	8 (n=7)	4 (n=10)

only 15 per cent finding this experience either fruitful or enjoyable and many complaining that they had not treated an orthodontic case as an undergraduate.[2] A postal questionnaire was chosen as the most efficient and cost effective method to assess GDPs' (in the greater Dublin area) satisfaction with the undergraduate orthodontic training they received.

Approximately 60 per cent of respondents regarded the academic and clinical components of their orthodontic teaching as adequate. In general, clinicians were less satisfied with clinical training than academic teaching in orthodontics (Table 2). Recent graduates (less than 10 years) were more satisfied with their overall training, a factor that may be related to modern methods of learning. Newer teaching methods include student-centred learning, guided self-learning, and the incorporation of problem-based learning concepts.[12]

An overwhelming majority of respondents (96 per cent) felt that orthodontics should be part of the undergraduate curriculum. This is consistent with results from other studies.[13] Undergraduate orthodontic teaching appears to be necessary as patients routinely enquire about the possibility or necessity of orthodontic treatment from dentists in primary care.[13,14]

Attempts to create referral guidelines for clinicians tend to have little effect on the appropriateness of referrals.[20] In our study, the majority (73 per cent (n=173)) of dentists referred to specialist orthodontic practices most often (Table 3). Only 22 per cent (n=53) of clinicians referred to the regional health authorities or to dental hospitals. Extensive waiting periods in both areas may help to explain this low

Table 5 Perceived abilities with reference to the 'First Five Years' document

Group Skill/knowledge	<10 yrs qualified (%)	10-20 yrs qualified (%)	>20 yrs qualified (%)	Total (%)
Competent at orthodontic assessment	88 (n=63)	65 (n=50)	57 (n=51)	69 (n=164)
Competent at management of orthodontic emergency	67 (n=48)	60 (n=46)	54 (n=48)	60 (n=142)
Competent at referring appropriately	97 (n=70)	97 (n=75)	94 (n=84)	96 (n=229)
Knowledge to explain & discuss treatment	68 (n=49)	84 (n=65)	88 (n=78)	81 (n=192)
Knowledge to design & use space maintainers	46 (n=33)	71 (n=55)	64 (n=57)	61 (n=145)
Knowledge to use removable appliances	74 (n=53)	78 (n=60)	78 (n=69)	76 (n=182)
Familiar with contemporary treatment	76 (n=55)	66 (n=51)	67 (n=60)	70 (n=166)
Familiar with limitations of orthodontics	89 (n=64)	77 (n=59)	81 (n=72)	82 (n=195)

figure. In addition, less severe cases are also not prioritised in the health authorities and these patients often request referral to a private specialist. Interestingly, five per cent (n=12) of GDPs report referring to non-specialists most often (Table 3). Some clinicians reported referring different types of malocclusions to different people. Factors influencing their referral pattern may include financial considerations, suspected waiting period and case severity.

Factors governing dentists' treatment philosophies for restorative work include self-esteem, patient preferences, reputation with patients and colleagues, benefits to the patient, the profession and society, professional responsibility, ethical considerations and cost-efficacy.[15] Many of these factors also affect their decision to perform orthodontic treatment. Another important factor in determining whether a practitioner carries out orthodontic treatment himself or refers directly to a specialist is the confidence he has in his own ability to adjust and monitor orthodontic appliances.[16] Over 25 per cent of respondents (n=69) carried out orthodontic treatment routinely. Interceptive procedures, including correction of anterior crossbite (24 per cent), maintenance of leeway space (15 per cent) and timely removal of primary canines (14 per cent), were most commonly performed. Eleven per cent (n=25) of the respondents regularly used fixed orthodontic appliances, with eight per cent (n=18) reporting treatment of Class 2 malocclusions and even fewer (four per cent (n=10)) reporting treatment of Class 3 occlusions commonly. In keeping with previous studies, our study (Table 4) indicated more experienced clinicians (>20 years qualified) tended to undertake a greater volume and variety of treatments.[17]

Seventy-five per cent (n=179) of GDPs suggested that general dentists should carry out more orthodontic procedures. Meanwhile, 65 per cent (n=155) expressed a desire to undertake more orthodontics themselves. The opportunity of completing treatment plans under the direction of orthodontic consultants was widely advocated. This possibility that has been proposed previously.[18]

Perceived knowledge and confidence of practitioners in orthodontics has rarely been assessed.[19] Perceived confidence at orthodontic assessment was very high particularly amongst more recently qualified GDPs with 88 per cent (n=63) regarding themselves capable of assessment (Table 5). Most importantly, almost all graduates (96 per cent (n=229)) felt competent at making appropriate orthodontic referrals (Table 5). Results for management of emergencies were less impressive, with on average 40 per cent (n=96) feeling incompetent in this area (Table 5) although the percentage was slightly less for GDPs who were qualified less than 10 years (33 per cent (n= 24)) and this may be attributable to their greater exposure to fixed appliance during their undergraduate training.

Most respondents (81 per cent (n=192)) reported having the requisite knowledge to explain and discuss treatment (Table 5), 61 per cent (n=145) felt they had sufficient knowledge to design and adjust space maintainers (Table 5). It is interesting that this was lowest amongst those most recently qualified (46 per cent (n=33)) (Table 5).

Previous reports have highlighted that only 46 per cent of recent graduates feel confident treating simple cases with removable appliances.[19] In this study, knowledge of removable appliances was high (>70 per cent) in all groups including recent graduates (Table 5). Respondents also reported familiarity with contemporary techniques and with the limitations of treatment (Table 5). Unsurprisingly, familiarity with contemporary treatments was greatest in those graduated less than 10 years.

Continuing education has been proposed as a method of developing lifelong learning.[21] Approximately 75 per cent of clinicians have attended or would like to attend courses on interceptive orthodontics and courses on orthodontic diagnosis (Table 7). One-third of these have already attended such a course and the remainder aspire to. A greater proportion of experienced clinicians have attended continuing education in orthodontics and it appears they also aspire to attend more courses in the future. This corroborates earlier results suggesting general practitioners often turn their attentions to orthodontics only after their practices are well-established.[17] However, this may also reflect a feeling in some new graduates that

Table 6 Previous attendance at continuing education courses

Group	<10 yrs qualified (%)	10-20 yrs qualified (%)	>20 yrs qualified (%)	Total (%)
Orthodontic diagnosis and treatment planning	24 (n=17)	32 (n=25)	30 (n=27)	29 (n=69)
Interceptive orthodontics	26 (n=19)	26 (n=20)	24 (n=21)	25 (n=60)
Hands-on practical course	15 (n=11)	17 (n=13)	19 (n=17)	17(n=41)

Table 7: Courses that respondents would like to attend

Group	<10 yrs qualified (%)	10-20 yrs qualified (%)	>20 yrs qualified (%)	Total (%)
Orthodontic diagnosis and treatment planning	46 (n=33)	43 (n=33)	48 (n=43)	46 (n=109)
Interceptive orthodontics	47 (n=34)	48 (n=37)	48 (n=43)	48 (n=114)
Hands-on practical course	33 (n=24)	43 (n=33)	38 (n=34)	38(n=91)

they are too recently qualified to require continuing education. Those who attended continuing education were more likely to practice orthodontics. Of those who had attended a course on interceptive orthodontics 43 per cent (n=49) regularly corrected anterior crossbites, 25 per cent (n=29) used functional appliances. Of practitioners who have not attended such courses, just 18 per cent (n=20) corrected anterior crossbites regularly and a meagre three per cent (n=3) were comfortable using functional appliances regularly. These results underline the value of continuing education in motivating practitioners to perform routine orthodontic procedures in practice.

Conclusion

A survey of attitudes of general practitioners to orthodontics was performed. The main conclusions include:

- Graduates are generally increasingly satisfied with undergraduate training. However, further advancements particularly in clinical aspects are desirable.
- One-quarter of clinicians regularly carry out orthodontic treatment. Interceptive treatments are performed most commonly.
- General practitioners feel they should carry out more orthodontic treatment.
- Results were generally good. However, perceived ability to deal with orthodontic emergencies is disappointing. The majority of recent graduates feel they lack the knowledge to design and use space maintainers. Almost three-quarters of dentists refer patients to specialist orthodontic practice.
- Interest in continuing orthodontic education is high. Courses in interceptive orthodontics and in orthodontic diagnosis are of most interest.

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The middle mesial canal of mandibular first molars

Dr Paul McCabe addresses the less well known middle mesial canal, which can lead to endodontic problems in mandibular first molars.

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Introduction

Root canal system anatomy plays a significant role in endodontic success and failure.[1,2] A statistically significant percentage of failures are related to missed root canal systems. Missed canal systems potentially hold tissue, bacteria and related irritants that inevitably contribute to clinical symptoms and lesions of endodontic origin.[2,3]

Several tooth groups have roots that notoriously hold additional canal systems such as the:

- maxillary first premolars,
- the maxillary first molars,
- the mandibular incisors, and
- the mandibular molars.[4]

Mandibular first molar anatomy

The mandibular first molar most commonly has three canals: two mesial canals (mesiolingual, mesiobuccal) and one distal canal (Figure 1). In approximately 30 per cent of mandibular first molars there is a second distal canal system (Figure 2).[4,5,6] When two distal canals are present, they are called the distobuccal and the distolingual canals. A less well known but nonetheless important canal, the **mid mesial canal system** may also be present.

The majority of literature pertaining to the anatomy of the mandibular first molars overlooks the possible presence of a ***mid mesial canal system*** focusing instead on the possibility of two distal canals. This canal may be located anywhere between the mesiobuccal and mesiolingual orifices. The canal itself may be independent with a separate foramen or may join apically with either the mesiobuccal or mesiolingual canals.

In 1974 Vertucci and Williams as well as Barker et al described the presence of an independent middle mesial canal.[7,8] More recently in 1989, Fabra-Campos in a study of 760 teeth found that the mid mesial canal was present in 2.6 per cent of the cases examined.[9]

The purpose of this article is to highlight the presence of this mid mesial canal system and to assist in its identification during root canal treatment.

Armamentarium and techniques for identification of the mid mesial canal

Anatomic familiarity is a prerequisite and a good access cavity is essential. In the case of the mandibular first molar with three

Figure 1: The classical access cavity outline for a mandibular first molar with three canals - mesiobuccal, mesiolingual, and one distal canal.

Figure 2: The classical access cavity outline for a mandibular first molar with two distal canals (distobuccal, distolingual).

canals, a roughly rectangular cavity outline tapering distally is the ideal cavity outline (Figure 1).

When there is a second distal canal system (30 per cent mandibular first molars), the access cavity should be modified and appropriately extended i.e. widened buccolingually on the distal aspect (Figure 2).

With regards to the mid mesial canal, the mesial extension of the access cavity should extend to almost incorporate the mesiobuccal and mesiolingual cusp tips and run parallel to the mesial marginal ridge (Figure2).

Pre-operative radiographic analysis is critical for endodontics. Multiple angled periapical views help reveal the presence of roots and canal systems. However, these may be of little value in the identification of a mid mesial canal system in a mandibular molar

Figure 3: Angled pre-operative periapical radiograph of a mandibular first molar requiring root canal treatment. The primary canals systems can be difficult to identify and the smaller accessory systems e.g. the mid mesial canal even more so.

Figure 4: Angled post-operative view of same tooth showing three separate mesial canals (mesibuccal, midlingual and mid mesial).

Figure 5: Actual access cavity showing the three fully prepared mesial canals of the same tooth.

Figure 6: Access cavity of a mandibular left first molar showing the orifice for the mid mesial canal (black arrow) positioned in the mesiolingual canal orifice (red arrow).

Figure 7: Radiograph showing the completed root canal treatment of the tooth in Figure 6.

Figure 8: The classical appearance of the 'white line' in the isthmus between the mesiobuccal and mesiolingual orifices. This is the same case as is illustrated in Figure 5.

Figure 9: Illustrates the impact of root canal preparation in the mid root section of the mesial root of a lower molar. The 'danger zone' is the concavity denoted by the red arrows. As the root canal space is prepared, the preparation advances towards the 'danger zone. This may be more exaggerated in the case of the mid mesial canal system.

because it is essentially radiographically invisible (Figures 3, 4 and 5).

Illumination and magnification will play a huge role in the identification of this anatomical feature if present. It can be found anywhere in the pulp chamber wall/floor fold between the mesiobuccal canal and the mesiolingual canal orifices. Studies have shown the impact illumination and magnification has on uncovering the presence of the second mesiobuccal canal system in maxillary molars (Figures 6 and 7).[10,11]

The use of ultrasonic tips with their abrasive coatings helps remove (sand away) dentine conservatively. The working end of these tips are 10-times smaller than the smallest round bur and consequently they can be introduced into the wall/floor angles of the pulp chamber to look for hidden systems.

The use of such tips eliminates the bulky heads of conventional handpieces which often obstruct vision and allows this 'chasing' to be carried out under direct vision. Any instrumentation on the floor of the pulp chamber should only be carried out under direct vision because of the risk of perforation.

The classical 'white line' between the mesiobuccal and mesiolingual orifices should invite further exploration in this area (Figure 8). This area can be chased and subsequently explored with small hand files for a 'catch'.

The preparation of this accessory canal system should be done cautiously and conservatively. With the increased use of rotary nickel titanium instruments in root canal preparation, the resulting preparations are better centred in the root. This may bring the preparation closer to the so called 'danger zone' which is the furcation side of the mesial root. The geometry of the mesial root shows it to be hourglass shaped and so a preparation in the mid section of the root is automatically closer to the danger zone increasing the possibility of a perforation.

Conclusions

The presence of the mid mesial canal in the mesial root of the mandibular first molar is reported to have an incidence of one to 15 per cent.[8,12,13] This canal may be located anywhere between the mesiobuccal and mesiolingual orifices. The canal itself may be independent with a separate foramen or may join apically with either the mesiobuccal or mesiolingual canals. Canal preparation is a key factor in endodontic success. Failure to prepare a canal system will often result in endodontic failure. The dentist should be aware of the possibility of a mid mesial canal and should explore for its presence rather than leave it to chance.

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Periodontics

A retrospective study of periodontal disease severity in smokers and non-smokers

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Background

Smoking has been associated with increased risk of periodontitis. The aim of the present study was to compare the periodontal disease severity of adult heavy smokers and never-smokers referred for assessment and treatment of chronic periodontitis.

Methods

A random sample of patients with at least 20 teeth, stratified for smoking and age (five-year blocks, 35 to 55 years) was selected from an original referral population of 1,221 subjects with chronic adult periodontitis. Adequate records for 59 never-smokers and 44 subjects who smoked at least 20 cigarettes per day were retrieved. The percentage of alveolar bone support was measured from dental panoramic radiographs with a Schei ruler at x3 magnification with the examiner unaware of the smoking status. Probing depths at six sites per tooth were obtained from the initial consultation.

Results

There was no significant difference in age between groups. Smokers had fewer teeth ($p<0.001$), fewer shallow pockets ($p<0.001$) and more deep probing depths ($p<0.001$). The differences were greater in subjects 45 years of age and over. In this age group, smokers had approximately 13 per cent more bone loss, 15 per cent more pockets in the 4-6mm category and seven per cent more pockets in the ≥7mm category than the never-smokers.

Conclusions

This study confirmed that smokers had evidence of more severe periodontal disease than never-smokers. The differences increased with age confirming an exposure-related response.

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Education

U.K. dental schools response to a questionnaire survey of endodontic curriculum guidelines

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Aim

To evaluate the impact of European Society of Endodontology curriculum guidelines on undergraduate teaching in the UK.

Methodology

A postal questionnaire was designed by two authors (WPS, GB) in 2003. This included open and closed questions relating to endodontic curricula and the impact of curriculum guidelines. This was sent with a cover letter to the 13 UK undergraduate schools. Data harvest was completed a year after the initial questionnaires were sent. Responses were collated and analysed qualitatively and quantitatively.

Results

Eight (62 per cent) questionnaires were returned. Analysis revealed divergence from aspects of curriculum guidelines. Guidelines were applied by seven schools. Four schools had not applied guidelines related to endodontic surgery as this was taught by departments of oral surgery. One respondent stated that the established curriculum was too inflexible to allow application. There was wide variation in curriculum structure with combinations of outcome, competency and problem-based learning. No schools had a separate department of endodontology. All schools felt graduates should be competent at de-novo treatment of single and multi-rooted teeth.

In general, competence was expected in single canal re-treatment but not multi-rooted teeth. Patient recruitment proved a major barrier to meeting guidelines. Number of cases to be completed by graduation ranged from six to 14 in total. Three schools felt that guidelines were not achievable citing lack of time, funds and appropriate staff.

All schools provided operative techniques classes prior to clinical treatment. These ranged from 20 to 120 hours (mean 43, S.D. 35.24.). Cases completed in these classes varied. For single rooted teeth this ranged from one to six (mean 2.57). For multi-rooted teeth this ranged from one to three (mean 2.14). Most schools had at least one faculty member with a special interest in endodontology. In seven schools however, teaching was also carried out by staff with no special interest. Five schools did not have a separate endodontic clinic. Five respondents had undergraduate learning in outreach centres. Trauma teaching was mainly carried out by in departments of paediatric dentistry.

Conclusions

There is wide variation in the delivery of endodontic curricula in the UK. Whilst curriculum guidelines are available, there are barriers to delivering these. Consideration should be given to revision of guidelines in light of their evident inapplicability in some areas.

BES Spring Scientific Meeting 2005 Research Poster

abstracts

Bridges

A prospective three-year study of fixed bridges linking Astra Tech ST implants to natural teeth

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Background
Connecting teeth and osseointegrated implants in fixed reconstructions is not generally recommended because of differences in their response to loading.

Aim
The aim of the present study was to assess the clinical and radiographic performance of the teeth and implants used to support three unit fixed bridges subjected to normal functional loads.

Subjects and methods
Nineteen subjects (10 males, nine females, age range 27 to 65 years) with an edentulous posterior free end saddle in either maxilla or mandible (Kennedy Class 2), and opposing natural teeth or a tooth-supported fixed bridge were treated and completed the three-year trial.

An Astra Tech ST implant (length: 9mm (n=2), 11mm (n=9) or 13mm (n=8); diameter: 4.5mm) was placed immediately distal to the last tooth or leaving a single premolar sized space. The distal tooth received a gold coping and the implant was restored with a customised prepable abutment (Astra Tech Profile BiAbutment: diameter 5.5 or 7mm).

A fixed bridge was placed linking the gold coping and implant abutment either with the pontic as a distal cantilever (n=6, length 7-8mm) or as a fixed design (n=13, length 6-12mm). Standardised radiographs and clinical records were taken at delivery of the prosthesis (baseline BL) and annually.

Results
Plaque scores at implant sites increased between BL and subsequent years ($P<0.02$). Statistically significant increases in probing depth were observed at both abutment teeth and implants between baseline and subsequent years ($P<0.001$). Marginal bone levels (mm) at the implant and tooth were stable between BL, 1-, 2- and 3-year examinations (implant: BL 0.65±0.42, one year 0.63±0.47, two years 0.88±0.55, three years 0.78±0.64; tooth: BL 2.29±0.82, 1 year 2.41±0.8, 2 years 2.38±1.02, 3 years 2.68±0.86). No signs of the intrusion of the abutment teeth were detected. One case of abutment screw loosening occurred. Eight bridges required re-cementation with a permanent cement in place of the temporary cement. There were eight subjects presenting with fractures/chips to the composite component of the bridges.

Conclusion
The three-year results demonstrate fully functional successful restorations with no evidence of tooth intrusion and with stable bone levels at both teeth and implants.

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Endodontics

Periapical status and quality of endodontic treatment in an adult Irish population

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Aim
To determine the prevalence of apical periodontitis and the quality of root fillings in an adult Irish population using a retrospective analysis of orthopantomograms (OPGs).

Methodology
A systematic sample of clinical records and OPGs of 302 adult patients attending the Dublin Dental Hospital, Ireland, were screened by two examiners to determine the quality of root canal treatment and the prevalence of apical periodontitis. The operators who carried out the treatment were unknown. Two examiners inspected OPGs after inter-examiner correlation. European Society of Endodontology (ESE) guidelines were used to determine adequacy of root treatment.

Results
Of the 7,427 teeth examined two per cent had root fillings. Apical periodontitis was evident in 1.6 per cent of all non-root filled teeth whilst 33.1 per cent of the subjects had at least one tooth with apical periodontitis. Of the root filled teeth, 25 per cent had apical periodontitis and 52.6 per cent were considered technically inadequate by ESE guidelines. There was a statistically significant ($P < 0.05$) negative correlation between the quality of the root fillings and the prevalence of apical periodontitis. Posterior root filled teeth (premolars and molars) had a greater prevalence of apical periodontitis than anterior root filled teeth.

Conclusions
The technical quality of root fillings in an adult Irish population was poor and was consistent with a high prevalence of apical periodontitis.

International Endodontic Journal. Volume 38 Issue 2; Page 81 - February 2005 doi:10.1111/j.1365-2591.2004.00902.x

Advice to authors

The following instructions to authors explain the format in which original material should be submitted to the Journal of the Irish Dental Association. This is recommended reading for anyone in the process of submitting material. Failure to follow these guidelines may result in rejection of manuscripts or delays in the review process and publication.

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  - Illustrations

Managing absenteeism - easier than pulling teeth?

Annemarie Wade, Director of Grant Thornton's HR Consulting service, TASK, on how to deal professionally with the difficult issue of staff absenteeism.

While high absenteeism can cause significant problems for any employer, in a dental practice the absence of just one employee can significantly impact on the productivity and efficiency of the business. As well as being affected by direct costs such as sick pay, overtime and staff replacement costs, there are also the indirect costs such as the impact on service and quality as well as the potential loss of patients. Aside from the cost issues, the co-workers of an absent employee may experience increased pressures in covering for their absent colleague. While most employees are willing to cover from colleagues from time-to-time, if an ongoing absenteeism problem is not addressed low morale and possibly knock-on absenteeism issues may arise.

No employer will have a zero absenteeism rate as absences occur for legitimate reasons such as illness and family emergencies. In most absences arising from routine illnesses, employees are acting responsibly by staying at home to recover rather than coming to work and either spreading their illness or risking a more severe illness or prolonged absence. A certain level of absenteeism is therefore to be expected.

However, absence can also be a symptom of a more serious underlying problem such as stress from added responsibility and tight schedules as employers try to do more with fewer workers. It may arise as a result of personal circumstances or a family crisis that requires them to take time off work. Alternatively, it could be a symptom of a bullying and/or harassment issue, which, if not investigated, could lead to significant costs to the practice as well as causing long-term damage to the employee.

Unfortunately many employers mishandle the issue of absenteeism by initially ignoring the problem until it reaches a crisis point and then through frustration acting rashly to dismiss an employee without following legally acceptable termination procedures. Whilst an employee can be dismissed arising out of ongoing absences due to illness, employment legislation requires that appropriate procedures are in place to effect such a dismissal. Such processes are usually formal in nature.

Clear records need to be in place to verify the process which was undertaken, i.e., details of the communication and meetings with the employee and where appropriate details of any disciplinary warnings which were issued along with records of medical opinions which were sought. Failure to handle the issue in an appropriate manner can leave an employer exposed to a costly claim for unfair dismissal.

In order to identify whether a problem exists either in the context of overall absenteeism costs to the practice or in respect of individual employees, it is essential to put in place measures to record and monitor absence. This can be done in a number of ways, e.g., manually, through the completion of absence record cards/timesheets/sign-in books, mechanically through clock-in systems, or alternatively through the use of computerised systems or spreadsheets. The IBEC Workplace Absence Survey undertaken in 2004 identified that the most common method of recording absence is via a manual system. The survey also confirmed that companies who formally record absence are more likely to have seen a decrease in both their short-term and long-term absence rather than those who record it informally, or not at all. The type of information which should be recorded at the time of absence includes:

- dates of absence
- certified or uncertified
- cause of absence
- costs incurred (including if appropriate details of rebates made to the company of employee social welfare benefits)

As mentioned above, the first step to managing absenteeism in a dental practice is to collect and analyse the relevant absenteeism data. Management then needs to put in place a number of measures which it can use for managing either short-term or longer term absences. The nature and approach to such measures will be somewhat influenced by the size and culture of the practice. Measures which can be considered include:

- the holding of return to work interviews
- referral for medical examination by practice nominated doctor
- offering support and welfare provisions
- invoking disciplinary procedures
- restrict the sick pay scheme
- attendance bonus reward scheme.

If absenteeism is being managed by a line manager then it is imperative that he/she is competent and well briefed on practice policy and that he/she has the support of practice management. Consistency of approach is essential to the success of any absenteeism management policy.

Substantial benefits can be achieved in a relatively short period of time through the introduction of an effective absence management policy. Employers who fail to introduce measures to reduce absence are missing a big opportunity to improve efficiency and reduce costs.

For further advice or information, contact:
Annemarie Wade, Director of Grant Thornton's HR Consulting Service, TASK.
Email awade@gt-irl.com
Website www.gt-irl.com

The Irish Dental Association Pension Scheme

An Interview with Eddie Hobbs

Eddie Hobbs is best known for being the consumer's champion in relation to financial products and services and presents the popular "Show me the Money" program on RTE television.

In this interview, Eddie comments on the Irish Dental Association Pension Scheme and how it compares to other pension plans available to self employed individuals.

Eddie Hobbs, best known for being the consumer's champion

Eddie, can you give us your initial thoughts on the IDA Pension Scheme ?

First and foremost it's important to know that this scheme was set up by dentists, for dentists and has been subject to important strategic reviews over the years. The trustees of the scheme are all dentists who are members of the Association and whose principle concern is to ensure that the scheme operates as efficiently and effectively as possible and ultimately offers the members a good pension scheme at a low cost.

Wearing your consumer hat would you consider the IDA Pension Scheme to represent good value for money?

The key measures are costs, fund choices, and service and by those standards the scheme is very good I think particularly since these give you access to PricewaterhouseCoopers (PwC) and not someone trained over a cup of coffee. Normally there are charges levied by brokers and insurance companies. Brokers may charge up front and/or ongoing commission or they may charge a fee. Insurance company charges include the annual management charge, monthly policy fees, Bid/ offer charges and switching charges. Regrettably sometimes these charges are not dealt with transparently by brokers, insurance companies and even referring accountants.

The charges under the IDA Pension Scheme are competitive and simple. There is a one off up front charge of 2.5%, which means that 97.5% of your contribution is invested on day 1, and the only other charge is the annual fund management charge of whichever fund you choose to invest in, these range from 0.8%pa to 1.25%pa.

The charges under the scheme finance a range of services including: fund management, administration of records, provision of a dedicated telephone helpline and website for members, and for providing information and assistance in relation to the investment of member's funds and the ongoing monitoring and guidance provided by the schemes advisors (PwC).

You have mentioned the costs of the scheme are competitive how do they compare to other products?

The best way of validating this is to compare the charges for the IDA Pension Scheme with those for a Standard PRSA, which is regarded by some, as the benchmark low cost pension product in the market.

Standard PRSA's were introduced to address the problem of high cost policies lacking transparency. They have capped charges which means that at least 95% of the contribution must be invested on day 1 and the fund manager charge cannot exceed 1%pa.

The charges under the IDA Pension Scheme means that 97.5% of the contribution is invested on day 1 (compared to 95% under a Standard PRSA) and the annual charge is between 0.8% and 1.25% depending on the fund selected (compared to 1% for a Standard PRSA).

This shows that the IDA Pension Scheme compares favourably to a Standard PRSA and as discussed the IDA Pension Scheme provides a wide range of additional benefits and services which would not be available by directly dealing with an insurance company.

Would you consider that the IDA Pension Scheme is an effective way for dentists to provide for their retirement, surely the trustees have a vested interest in promoting their scheme above any other arrangement?

That's not their job –the trustees have no vested interest in promoting the scheme to members other than the knowledge that their efforts have provided members of the organisation with a flexible, competitively priced pension arrangement. The scheme isn't the only game in town but it is a good, viable and well-constructed choice.

Does the IDA Pension Scheme provide any other features that can benefit members?

Members can retire at any time between the ages of 60 and 75 without penalty. Some Life Office products that smooth out asset volatility penalise policyholders if they retire at a date earlier than that indicated on their policy.

Members can switch between funds as often as they like free of charge which is very important to the informed investor and those hitting the brakes before retirement

The trustees are not restricted or limited in the number of fund managers they wish to make available to members of the Scheme. New fund managers can be added and old ones fired.

The Schemes consultants PwC monitor the performance of the fund managers to ensure that they perform in line with the objectives that have been set.

The telephone "Helpline" operated by PwC is available to members to query their accounts and obtain advice and information in relation to pension matters.

A vital line of communication is open to PwC when members are examining the critical issue of surrendering capital to buy a pension for life or opting for continued investment in ARF's at retirement. This requires skilled study, careful advice and breakeven analysis.

To learn more call the IDA Pensions Helpline on 01 – 662 6755 or visit the website www.idapensions.com.

The last step towards a paperless surgery

Robert Powell, Managing Director, Software of Excellence, looks at how to achieve the goal of a paper free surgery.

The paperless office was the dream of the early computer manufacturers, their proud vision of how technology would revolutionise our working lives. A generation ago this goal was still a long way off, but continuing developments mean it is almost within reach, and what's more not only for the office but for the surgery too. The advantages are obvious; not only will you find yourself in a cleaner more pleasant working environment you'll create a positive (and lasting) impression with patients as your surgery is uncluttered and operating efficiently. In addition, you'll be free to concentrate on treatment rather than frantically looking for that important piece of paper (you can't remember what you wrote on it, but you know it's important and you know it's in the mountainous in-tray somewhere)

To achieve this goal you'll need to know that both you and your patients can rely on your practice systems with *absolute* confidence. Your patients don't want to be kept waiting in bottlenecks at reception, and you want to know who's coming and when, so you can prepare the correct treatment. To become a paperless surgery, your practice's system will have to become your diary, your treatment plan, your price list, your filing and your accounts. Given the many demands placed on it, you'll want your solution to be easy to use.

Clearly the decision on which management system to choose will be a vital one for your practice, but it can be broken down into choosing the system and choosing the version or application. In choosing the system you're likely to ask yourself two main questions, "What are the benefits to me?" and "How does the new system work?" Having chosen your system, you're likely to want to know that enhanced function such as digital x-ray integration is available for when you need it.

Peak Performance - The 2005 IDA Annual Scientific Conference

Aisling O'Mahony reviews the Irish Dental's Association Annual Scientific Conference, which was held recently in Killarney, Co Kerry.

The IDA 2005 IDA Annual Scientific Conference, which was held in the glorious setting of Killarney in County Kerry over the weekend of the 14 to 16 April, was a great success and the academic and social programmes were enjoyed by one and all.

Congratulations to the IDA President, Gerry McCarthy and his conference committee, which was chaired by Pat Cleary, for an excellent programme.

The trade show was also particularly good this year.

Practice matters

The programme kicked off with pre-conference programmes on all matters related to practice.

These included an excellent presentation by Dr Richard Mitzman on practice design during which he revealed seven points for successful design:

- Design out clutter
- Steri walls
- Designing central sterilisation and storage
- Using twin surgeries to increase profitability by 30 to 50 per cent
- Use two assistants
- Dual circulation – patients circulate outside; staff inside. Staff traffic and patient traffic don't interfere with one another
- Waiting rooms and receptions have to 'wow' the patient.

Other issues addressed included an excellent review of digital X-ray systems by Dr Maurice Fitzgerald; the paperless practice by Simon Knox; an insight into the practical experiences of integrating modern technology into a dental practice; some valuable tips on how to efficiently schedule patients from Dr Garry Harvey; and a timely presentation by Derek Ryan on making the most from investments.

Running parallel to the practice presentations were a series of three workshops on treatment planning by Dr Derrick Setchell; paediatric dentistry by Drs Dympna Daly and John Walsh; and, current trends in implant technology by Dr Niall O'Leary.

The 'lunches for learning' were a huge success with a wide variety of topics covered and really are an excellent format for learning and discussion.

The Dental Nurses programme was an outstanding success and addressed many topical issues such as systemic illness and the dental patient, the relationship between periodontal disease and cardiac problems, smoking cessation, oral cancer screening. It was extremely well attended and enjoyed by all.

In addition to the scientific presentations, there was a range of popular leisure activities arranged for delegates. Included in these were golf and tennis tournaments, a leisure cycle, a hill walk through the National Park at Torc Mountain, a charity fun run and a course designed to improve delegates' photographic skills.

The highlight of the social side of the conference was of course the annual ball.

Face to face

Dr Walter de Vota and Dr Derek Setchell face off at the outset of a head to head discussion session on various dental topics.
One of the highlights of the conference was the match between Dr Derek Setchell and Dr Walter deVota, which was fairly referreed by Dr Edward Cotter.
Each was given the opportunity to discuss his treatment philosophy for problems such as the traumatised vital central incisor, restoration of the non-vital tooth (anterior and posterior), restoration of the worn dentition. Both presentations were excellent and gave insight into different approaches based on slightly different interpretations of the same literature.

Gerry McCarthy, President of the IDA, opens the conference proceedings.

Dr Andre Haig takes delegates on a journey into micro-dentistry and asks them to consider the question: is microdentistry the future?

Bernice Fitzgibbon addresses the delegates at the 2005 Annual Scientific Conference.

Bernice Fitzgibbon with Gerry McCarthy, IDA President, and Donal Atkins, IDA Secretary General of the Irish Dental Association.

Around the stands

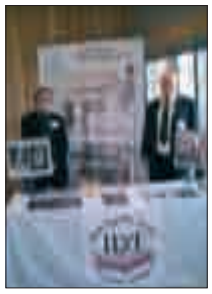
A pictorial of what companies had a presence at the 2005 IDA Annual Scientific Conference.

Blauna McDonagh and George Fleeton of Dentsply

Lorna Spillane and Damien McCormack of GSK/Sensodyne

Robert Powell and Simon Knox of SOE Dental Software

Nigel Harper-Scott of J&S Davis



Barry Haycock and Anthony Reynolds of Image Diagnostic Technology Ltd.

Jim O'Neill and Sean O'Sullivan of O'Neill Dental

Gerry Kerr of CDW and Uwe Möhring of Biolase

Roseanne Dunne, Alannah McIntyre and Ciara Cauldwell of Listerine

Darren Gibson of Claudius Ash

Jean McGrath of Microbrush International

David Greham and Dr John Rafelt of 3M ESPE

Douglas Pitman of DP Medical

Janice Donoghue and Olivia Kieran of 3i

Grainne Teefy and Valerie Kiernan of Colgate

Brian Rogers, Colm Rogers and John Harvey of Rogers Healthcare Ltd.

Brian Jones of Colténe Whaledent

Ernesto Jaconelli and Graham Parker of Trophy

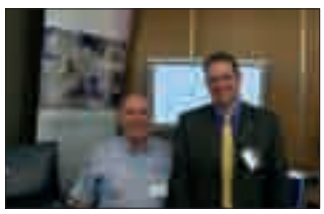
Paddy O'Sullivan and Dr. Barney Murphy of Karma

Aisling Hayes, Seamus O'Neill and Catriona Lynskey of Irish Dental

Andrew Scannell of Voco

conference

Audrey Duffy and Larry Hudson of Ontological Supplies with Paula MacDonnell of SDI



Wayne Curtis and Craig Evans of Henry Schein Technologies Ireland

Joanna Rose, Roslyn Gavin, Aidan McCormack and Elaine Sheehan of McCormack Horner

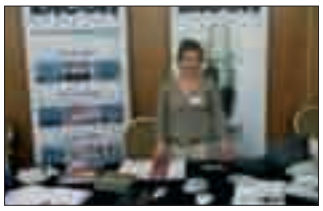
Beccy Haworth and Elaine Sowerby of Optident White

Edel Quinn, Zeta O'Keefe and Sarah Cleary of Henry Schein

Helen Curran of Johnson&Johnson

David Walsh, Gerry Kerr and Nigel B. Coates of CDW

Gerry Lavery of Septodont



Grace Kelly of Bicon

Helen Curran of Johnson&Johnson

Padraig Riordan, Rose Seldon and Eamonn Farrell of Nobel Biocare

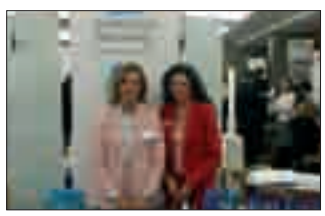
Lynn Lynas and Robert Service of McDowell and Service Dental Lab Ltd.

Emma Comerford and Eamonn Conneely of AIB, Finian Quinn of AIB Finance and Leasing, and Karen Egan and Derek Ryan of Goodbody Stockbrokers

Colin Denman, Sarah Mangan, Olivia Griffin and Pat Foley of ProMed

Jo Hartop and Lauren Striers of Wrigley

Anna Karlson and Rebecca Lupton of Dental Protection

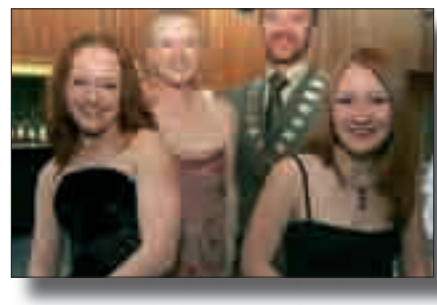


Joanna Tordoff and Grainne O'Gorman of Oral B

Brian O'Shiel of Celtic Marketing Ltd.

The belles of the ball

The Journal captures some of the highlights of this year's Ball, which was the high point of the social side of the 2005 Annual Scientific Conference, which was held recently in Killarney, Co Kerry.

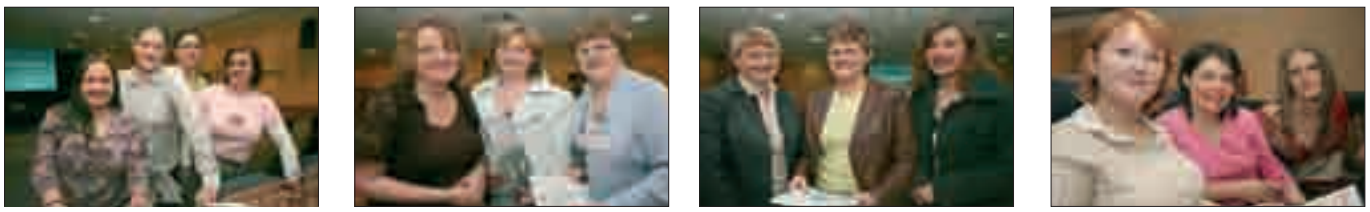








Dental nurses meet



Complimenting the main conference was a gathering of the country's dental nurses. Here we take a look at some of those who attended.

IDA Metro Branch AGM

The IDA Metro Branch AGM dental meeting, which took place in the Berkeley Court Hotel in Dublin on March 10, was sponsored by GlaxoSmithKline Consumer Healthcare. Here are a few of those who attended.

Garry Heavey; Lorna Spillane, GlaxoSmithKline dental detailer; and David Ruthledge.

Liz Rowen, GlaxoSmithKline Marketing Director of Oral Healthcare; Eamon Croke; Lorna Spillane GlaxoSmithKline. dental detailer; and Sean Malone

Brian Kavanagh; and Lorna Spillane, GlaxoSmithKline dental detailer.

Dental nurses AGM

GlaxoSmithKline's Lorna Spillane and Elaine Banfield of the Irish Dental Nurses Association (IDNA) are pictured at the IDNA's AGM which took place in the Hilton Hotel in Dublin and was supported by GlaxoSmithKline.

Classified advert procedure

Please read these instructions prior to sending an advertisement. Below are the charges for placing an advertisement for both members and non-members. Advertisements will only be accepted in writing via fax, letter or email (fionnuala@irishdentalassoc.ie). Non-members must pre-pay for advertisements by cheque made payable to the Irish Dental Association. If a box number is required, please indicate this at the end of the ad (replies to box number X). Classified ads placed in the Journal are also published on our website www.dentist.ie within 48 hours, for 12 weeks.

Ad	members	non-members	
Length of ad	up to 25 words	€75	€95
Length of ad	26 to 40 words	€90	€110

Non-members must send in a cheque in advance with their ad

The maximum number of words for classified ads is 40. If the ad is in excess of 40 words, then please contact:

Rebecca Markey
IFP Media, 31 Deansgrange Road, Blackrock, Co Dublin
Tel: 01-2893305
Fax: 01-2897546
Email: rebecca@ifpmedia.com

FULL TIME

Associate required for long established practice busy midlands town. One hour from Dublin. Three years' experience required. Modern practice, hygienist, OPG machine, etc. Contact Box No. J2005.004.

Full-time associate position available in multiple practice for person wishing to locate in Dublin with a view to an expense sharing partnership. This position would suit a graduate with experience. Enquiries will be treated in strictest confidence. Replies to Box No. J2005.007.

Full/part-time associate required for busy practice in Midland Town. One hour Dublin. Full support staff. Hygienist, OPG, etc. Tel: 044 40579.

Experienced associate wanted for busy Dublin 9 private practice. Hygienist and OPG. Top rates. Tel: 01-8312487/8312814, 9am to 5pm.

Locum dentist required for busy north Dublin practice for July and August. Tel: 086-1726061 after 7p.m.

Experienced associate dental surgeon required for busy, private, south-side dental practice from May 2005. Fully equipped, hygienist, etc. Tel: 087-2239743.

Associate required for busy modern practice in Clifden, Galway (one hour from Galway city). Tel: 087-9972877 (evenings).

Dental associate required for busy dental practice June 2005 in large satellite town 40 minutes from Dublin. Position suit conscientious, experienced young dentist. Full book, immediate, friendly staff. Expanding modern surgery. Tel: 086-8244606 (evenings) or email CV to Eilee19561@hotmail.com.

Associate required to replace busy colleague in northeast. Modern two-man practice, hygienist, OPG. Part-time considered. Tel: 086-2561572.

Associate. Full-time associate required immediately for busy, southwest Dublin practice. Tel: 01-4512194 or 01-4624910.

Locum required for three to four weeks in busy general dental practice, Castlebar, Co Mayo. Weeks/dates negotiable. Accommodation available. Tel: 094-90-25281 or 087-4180907 evenings.

Locum dentist required. Full-time position in general dental practice, 30mins north of Dublin, from early April to August 2005. Well established, two surgery practice (dentist plus hygienist). Part-time applicants considered. Tel: 041-9846333 (daytime) or 086-8583366.

Galway City Centre practice. Immediate vacancy. Dentist with experience in oral surgery and implants, view to partnership. Tel: 086 8510373.

Dental nurse required. Busy city centre practice on O'Connell St re-opening shortly requires competent and trained dental nurse for immediate start. Contact Simon at 087-6423775.

Associate dental surgeon required for expanding practice near Kilkenny city. Full or part-time with possible partnership for the right person. Excellent opportunity in friendly small town practice. Tel: 056-7706980 after 6p.m.

Dental associate. Dentist required as associate for Dundalk group practice starting July 2005. Air-conditioned surgery. Fully computerised practice with digital X-ray, hygienists and support of other colleagues. Tel: 087-2879858.

Norfolk, England. Excellent opportunity for salaried dentist in newly refurbished ultra modern practice 30 miles north of Cambridge. Fully computerised, digital X-rays, digital Panoral, intra oral cameras, experienced staff. Low cost daily flights Norwich - Dublin. Contact 0044-1362-821297 or 0044-7900-216174.

Recently qualified dentist required in York, England. Salary £28,000 - £40,000, help with accommodation if required. We are looking for a friendly, hardworking person to join our team and develop their skills. Contact andreaubhi@aol.com or tel: 0044-1904-619386.

Kent UK - Ready for a change? Well equipped surgery in expanding practice in coastal Whitstable, easy reach of London. PDS salary available or % negotiable. 20 mins from Eu Jet Dublin/Shannon, 30 mins Eurotunnel. Tel: 0044-1227-710334 evenings or karen@khicks.co.uk.

PART TIME

Part-time associate dentist required to join busy Cork suburb practice. Suit quality, friendly motivated dentist. Must be experienced. Long-term arrangements possible. Replies to Box No. J205.003.

Dental associate required to cover maternity leave and/or permanent part-time position in busy two surgery practice. Three quarter hour from Cork, half-hour from Limerick. Immediate start available (part-time). Maternity from October 2005 to March 2006. Replies to Box No. J205.005.

Dental associate required - Dublin 5. Start June/July. Two to two-and-a-half days per week in busy, newly equipped practice with hygienist. Phone Chris 085 7390598.

Wicklow. Part-time dentist required in modern general practice. Tel: 086-1538913.

Dental hygienist required in busy practice in Galway for one to two days per week. Established book. Modern practice. Tel: 087 2151815.

Locum dental hygienist required in the southeast for one to two days per week. Busy modern practice. Tel: 087-6687580 after 6p.m.

North Kildare - Part-time associate required for Thursdays and Fridays from end of June for six months to cover maternity leave. Possible permanent position. Newly qualified welcome. Tel: 045-892722 (evenings).

Hygienist required. Part-time position available with the HSE southwest - Dublin city centre and West Dublin. Contact Dr Colleen O'Neill, Principal Dental Surgeon, for further details. Tel: 01-6455421.

Associate required for two days per week in busy two-person surgery in south Tipperary. Tel: 087-8344001.

Part-time dentist wanted. Permanent part-time position available in Dublin city centre (D2) practice. Superb conditions and remuneration. Call Emmet: 086-8187373.

Wanted: part-time associate to replace departing colleague. Busy general practice in southeast. Modern well equipped surgery with full-time hygienist and OPG. Tel: 086-8586673 after 6p.m.

Busy general practice in southeast requires visiting specialist - endo/ortho/perio/pros - for sessional/day work. Fully equipped modern surgery available. Contact 086 8586673 after 6p.m.

Hygienist required in city centre practice for Tuesday afternoons. Tel: 01-6701166.

POSITIONS SOUGHT

Specialist orthodontist seeking one day per week in practice. Saturdays an option. Tel: 087-1325343.

Experienced dental surgeon available for two days per week in southwest as locum/part-time associate. Tel: 087-7552044.

Dentist available to work as locum, preferably in Munster region for July and August. Tel: 087-9894069 after 7.30p.m.

Dentist, 2001 graduate, seeks full-time associate position, from mid-June, in any location in Ireland, but particularly the Galway region. Contact conordurack@hotmail.com.

FOR SALE or RENT

Dentist practice for sale or lease. Long established two-man practice. Centrally located in busy town in northeast. OPG and hygienist. Replies to Box No. J205.002.

Dental practice for sale. South Dublin suburb. Part-time (five sessions per week). Good turnover. Low overheads. Leasehold. Tel: 087-6397747.

Medical suites to let: Redmond Square Medical Centre, Wexford Town. Purpose-built suites ideal for dental practice. Hi-spec, prime location, fully air conditioned, floor areas to suit your needs. Brochure on request. Contact Remax Wexford 053-21977 or Benny Sullivan 087-2460347.

Periodontal practice for sale. Successful, highly profitable periodontal practice in London UK for sale. Fully private. No NHS. Established over 20 years. Three part-time periodontists and large referral base. Replies to Box No. J205.006.

Galway City. Fantastic opportunity full time associate. Sale prospects. Great location, ample parking. OPG, Hygienist, three Surgeries, huge potential, very busy, immediate position. Tel: 086-8075273

Dublin South. Four miles city centre. Excellent location. Superb opportunity. Long established. Very busy. Excellent figures. Price flexible. Dentist retiring. Tel: 086-8075273

Dublin city centre. Superb location. Secure leasehold. Very busy. Excellent loyal patient base. No med cards. Huge potential. Dentist moving outside the area. Tel: 086-8198887.

Kilkenny City outskirts, leasehold for sale. Huge potential. Equipment very good. Fantastic opportunity. Area wide open. Realistic price for quick sale. Dentist retiring. Tel: 086-8075273

Midlands. 40 mins Dublin. Fantastic opportunity. Freehold/leasehold. Long Established, two-man, very busy. Booming town. OPG hygienist. No medical card. Expansion possible. Tel: 086-8075273.

Midlands. One hour to Dublin. Long established, single-handed. Equipment good. OPG. Excellent figures. All flexible options freehold/leasehold/goodwill. Superb opportunity. Wide open. Tel: 086-8075273.

Dublin city centre 1.5 miles. Leasehold. Single-handed. Option to expand. Low rent. Huge potential. Dentist retiring. Income steady. Giveaway price. Tel: 086-8075273.

Galway. Superb thriving practice. Sale/associates options. Leasehold/freehold. Three surgeries. Top class equipment. Fully computerised. Fantastic location. Excellent profits. Open to offers. Tel: 086-8075273.

Galway city outskirts. Medical centre. Full PP. Excellent location/facilities. No medical cards. Area wide open for good dentistry. All negotiable/flexible. Tel: 086-8075273.

Donegal. Long established. Two surgery. Excellent practice equipment. Massive potential. All options open. Freehold/leasehold. Principal can stay as associate. Huge nos new patients. Tel: 086-8198887.

South Dublin. Four minutes DART. Two surgeries. Leasehold. Hygienist. OPG. Brilliant location. Area huge development started. Expansion possible. Rent reasonable. Excellent figures. Mob: 086-8198887.

Associate. Superb opportunity for enthusiastic, progressive colleague. Long established. Three surgery. Top class equipment - practice. Huge growth underway. All options open. Tel: 086-8198887.

South Dublin. Excellent leasehold. Well equipped. Two surgeries. Great space. Low rent. Good Location. Low medical card nos. Huge opportunity to expand. Tel: 086-8075273.

Associate. Two surgery. Growing practice. OPG. Hygienist. Very busy. Top class equipment/set-up. DART line. Excellent staff. Good figures. Immediate start. Departing Colleague. Mob: 086-8198887

Busy dental practice for sale. Experienced dentist required for the sale of a practice in a county Cork town. For information contact Breda O'Donovan on 021-4907000 or email bodonovan@deloitte.ie.

Panaray panoramic and lateral skull X-ray machine (American X-Ray Co). In mint condition with operational manuals and video - reasonable asking price. Tel: 01 2963035.

Midlands (Carlow region) one-man dental practice for sale. Well established. Fully private and PRSI. Large potential for expansion in rapidly growing area. Excellent opportunity. Guide price 215K o.n.o. Tel: 087 6826840 after 7p.m only.

Dental practice and premises for Sale. Dublin city centre three miles. Superb location, freehold, two-man practice (three surgeries). Long established with huge potential to expand. OPG and Hygienist. Mainly private. Contact Dublin 01-6686929 (evenings).

Specialists: dental surgery available to rent on a sessional basis in two-surgery specialist practice. D4 area. Ample free parking. Tel: 01- 2196835.

To let. Clontarf, Howth Road. Long established high profile dental practice. Detached house, 2000 sq ft. Part or all available. Parking. McCabe 8332222.

St Alphonsus Road, Dundalk. Prime located detached surgery premises in a densely populated area containing 92.5sq.m., site area 454sq.m. with parking for up to 15 cars at rear. Tel: 042-9334235.

MISC

I would like to buy an old dental chair. Phone Jacques at 087 6866180

Wanted for purchase: busy one or two-man dental surgery in southern Ireland. Tel: 0044-1622-720956 evenings.

Diary of events

May

Irish Dental Association - Golf Society - Lyttle Cup
Date: 20 May 2005
Venue: County Louth Golf Club
The Annual Golf outing between the Irish Dental Association and the Northern Ireland Branch of the British Dental Association.
For details contact Dr Ciaran Burke, 01-4574733.

June

Nobel Biocare World Conference
Date: 5-9 June 2005
Venue: Las Vegas, USA
For further information contact www.nobelbiocare.com

Fourth Annual Conference - Irish Society for Disability and Oral Health
Integrated Oral Health Care for People with Disability
Date: 17 June 2005
Venue: Fottrell Theatre, Arts Millennium Building, NUI Galway
For further information contact Antoinette.Nolan@mailn.hse.ie or mobile 086-8207792.

First International Symposium on Regional Anaesthesia and Pain Control
Date: 16-19 June 2005
Venue: Hotel Excelsior, Dubrovnik, Croatia
For further information see http://euroval.hr/kongresi/dubrovnik/eng/index.php

Twelfth International Dental Congress and Expodental 2005, Istanbul
Date: 20-25 June 2005
Venue: Istanbul Convention and Exhibition Centre (ICEC), Turkey
For further information contact info@istanbul-2005.com or www.istanbul-2005.com

August

FDI World Dental Congress
Date: 24-27 August 2005
Venue: Montreal, Canada
For further information contact www.fdiworldental.org

September

Sixth International Orthodontic Congress and Third Meeting of the World Federation of Orthodontists
Date: 11-15 September 2005
Venue: Paris, France

Discover Your Roots - 12th Biennial Congress, European Society of Endodontology
Date: 15th-17th September 2005
Venue: Trinity College Dublin, Ireland
For further information contact anne@abbey.ie or www.abbeyconference.com

Medicine 2005
Date: 19-22 September 2005
Venue: Minsk, Republic of Belarus

Karma Dental - Contemporary Bondodontics "Aesthetics with minimal invasion and adhesion"
Date: 30 September 2005
Venue: Great Southern Hotel, Dublin Airport
One-day lecture by Dr Raymond Bertolotti. For further details tel: 01-8376296 or email karma@eircom.net.

October

International Dental Showcase
Date: 6-8 October 2005
For further details go to www.dentalshowcase.com

ADA - American Dental Association Annual Meeting
Date: 7-10 October 2005
Venue: Philadelphia, Pennsylvania, USA

"Oral Cancer - The Patients Journey" - The Faculty of Dentistry, Royal College of Surgeons in Ireland
Date: 27-28 October 2005
Venue: Faculty of Dentistry, Royal College of Surgeons in Ireland
Queries to facdentistry@rcsi.ie

IAPD Frontiers of Paediatric Dentistry
Date: 31 October to 5 November 2005
Venue: Sydney, Australia
Hosted by the Australian and New Zealand Society of Paediatric Dentistry. www.iapd2005.com

November

Health Board Dental Surgeons Seminar
Date: 16-18 November 2005
Venue: Newpark Hotel, Kilkenny
For further information contact Joan Bracken, Tel: 01-2830499, Email joan@irishdentalassoc.ie

Greater New York Dental Meeting
Date: 25-30 November 2005
Venue: New York, USA

December

First International Workshop of the International Cleft Lip and Palate Foundation
Date: 3-6 December 2005
Venue: Balaji Cranofacial Hospital & Research Institute, 30, K.B. Dasan Road, Teynampet, Chennai, India.

Summer 2005 Quiz

What is the abnormality?

Answers to
Summer 2005 Quiz
The Irish Dental Association
10 Richview Office Park
Clonskeagh Road
Dublin 14

Submitted by
SR Flint MA, PhD(Brist), MBBS(Hons), BDS(Lond), FDSRCS(Eng), FFDRCSI, FICD.
Consultant and Senior Lecturer in Oral Medicine
Dublin Dental School and Hospital

Spring 2005 quiz winner

Congratulations to Dr Jerome P Mullane of Bishop Street, Newcastle West in County Limerick, who was the winner of the spring 2005 quiz.

The answers were:

The diagnosis is: anterior hyperfunction syndrome (combination syndrome).

The classic clinical signs are: bone loss in the anterior maxillary ridge overgrowth of the maxillary tuberosities;
papillary hyperplasia in the hard palate;
supereruption of the lower anterior teeth; and,
loss of bone under partial denture bases of the anterior edentulous ridge, hyperplastic tissue in the labial sulcus.

It is caused by: maxillary complete denture opposed by mandibular anterior teeth and the consequent excessive forces on the anterior maxilla.

It is best avoided by: by restoring posterior distal extension edentulous spaces to distibute most of occlusal forces to the posterior maxillary ridge.