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The Maltese Dental Journal





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Editorial

DENTAL ASSOCIATION OF MALTA

The Professional Centre,
Sliema Road, Gzira
Tel: 21 312888
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By Dr David Muscat

Dear colleagues,

These are the latest DAM events correct at the time of writing this article. The DAM is putting forward its proposals regarding the Health reforms. We are also trying to negotiate a good Vodafone deal for our members.

Recent information from Brussels: The Council Of The European Union has decided that a maximum concentration of 0.1% hydrogen peroxide or less for oral products including mouthwashes, toothpaste and tooth whitening or bleaching products sold to the public. Dentists may purchase 0.1%-6% hydrogen peroxide or less and use in their clinics and then give to their patients under instruction. Patients under 18 years of age should not have tooth whitening carried out. Each EU country has 12 months to implement this in its legislation.

Best regards,

David

Dr David Muscat B.D.S. (LON)
Editor, Vice President and P.R.O. D.A.M.

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RECENT/PLANNED EVENTS

16 JUNE

Casino Di Venezia Noprilam event.

6 JULY

Cariac event at Le Meridien.

27 JULY

Oral B Event at The Palace.

14 SEPTEMBER

Orthodontics lecture by Dr Kevin Mulligan followed by reception at The Excelsior sponsored by AM Mangion Aurobindo and Menarini Int.

22-23 SEPTEMBER

Dentaurum Conference at Le Meridien.

20 OCTOBER

DAM dinner at Wigs 8.30pm sponsored by Pharma M.T. agents for Fittydent.

1 NOVEMBER

At 8pm at MFPB lecture on 'Life before Man' by Dr Charles Galea Bonavia followed by dinner at Café Jubilee.

2 NOVEMBER

Simpler Implants launch by Cherubino.

9 NOVEMBER

Smile For Health.

23 NOVEMBER

Dental Pain – Odontogenic and non-Odontogenic. Lecture by Dr Dan Keir.

DECEMBER

Christmas Party.

THE DAM ST APOLLONIA QUIZ AT BUON APPETTO

With prizes sponsored by
George Farrugia & Sons

1. What is the name of the most expensive sports car in the world?
The Bugatti Veyron. 267mph. 0-60 in 2.5 seconds. Aluminium narrow angle 8 litre W16 engine with 1,200hp. US\$1.7million.
2. How many component iron metal parts make up the Eiffel Tower?
18,038 parts. 3,000 workshop drawings and 700 engineering plans. Built to celebrate the 100th anniversary of the French Revolution by Gustave Eiffel and inaugurated on 31 March 1889.
3. In which European country do the 'Sorb' minority live?
This Slavonic people live in Germany.
4. Who wrote the book 'Shout at the Devil'?
Wilbur Smith.
5. How many moons does the earth have?
One. However in 1986 the 'Earth's second moon' was discovered. 5km in diameter, it is in fact a massive asteroid orbiting the sun, sharing the earth's orbit following a kidney bean-shaped horseshoe orbit ahead of the earth, taking slightly less than a year to complete a circuit.
6. In Theramed 2 in 1 toothpaste and mouthwash, what crystals are present?
Polar crystals. These are 'cooling crystals'.
7. SUPPLEMENTARY QUESTION (as there was a tie on the 'Blackberry Table' with 3 contestants coincidentally next to one another having identical answers)
In The Chinese astrological calendar, what year is it this year?
The year of the rabbit.

Winner: Dr Nick Dougall

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Chev. Messina-Ferrante was recently presented with the Jan Masaryk medal and certificate of Honour at the Czech Ministry of Foreign Affairs for his outstanding efforts in promoting Czech-Maltese relations by H. E. Vladimir Zavazal during a reception hosted to the Diplomatic Corps and various Government officials. Photo: Dr Herbert Messina-Ferrante (centre), on his left the Ambassador V. Zavazal and on his right Mr T. Casapinta, Hon. Consul General of the Czech Republic in Malta.

This issue is divided in two sections: the first section provides updates on EU topics relevant to the dental profession and the second section contains more general information regarding EU policy.

SECTION I

EU TOPICS RELEVANT TO THE DENTAL PROFESSION

DIRECTIVE ON THE RECOGNITION OF PROFESSIONAL QUALIFICATIONS (2005/36/EC)

Evaluation process – next steps.

- Green Paper and Commission's evaluation report to be published on 22 June 2011;
- Consultation period planned for summer 2011;
- Legislative proposal on the modernisation of Directive 2005/36/EC by the end 2011.

STEERING GROUP ON PROFESSIONAL CARDS

This Group met for the fourth time on 23 May and is planning to meet again on 8 July and 9 September. The Group was divided into sub-groups, according to each case study profession (doctors, nurses, engineers, physiotherapists, etc), to focus on what they consider being workable solutions for their respective professions. The Group is expected to present its final report in October at the Single Market Forum Workshop.

MEDICAL DEVICES

The Commission-led Medical Devices Expert Group (MDEG) which brings together competent authorities, notified bodies, industry and stakeholders such as the CED, met on 6 June 2011 to discuss the current legislative issues. The publication of a formal proposal for the recast of the Medical Devices Directives is planned for the second quarter of 2012; an assessment report will be published simultaneously. The second special MDEG meeting where the Commission will outline its legislative proposal will take place in the autumn of 2011.

The Regulatory Committee on Medical Devices will deliberate on the draft regulation on e-Labeling on 20 September 2011. The draft regulation sets out conditions according to which instructions for use for medical devices in paper form may be replaced by electronic instructions. It limits the possibility of providing instructions for use in electronic form to defined medical devices and contains a range of procedural safeguards. Instructions for use will still have to be provided to the users in paper form on request.

The Commission is preparing a proposal for the revision of the Euratom Directives on ionising radiation (96/29/Euratom, 97/43/Euratom and others). The directives are expected to be merged into a single directive which will introduce new requirements for assessment and vigilance in connection to medical exposure.

The European Ad Hoc Working Group on Unique Device Identification (UDI) met on 20 June 2011. While the US is expected to adopt its own legislation on UDI for medical devices within the next few months and the Global Harmonization Task Force will agree on a guidance for a global UDI system in September, the Commission is developing a general guidance on UDI which is expected to be adopted before the recast of the Medical Devices Directives. The guidance will not be legally binding and is meant to provide common EU standards for those Member States developing their own national UDI systems. The guidance will list the

obligations of manufacturers, importers and authorized representatives and only recommendations for users.

COUNCIL CONCLUSIONS

On 6 June 2011, the Employment, Social Policy, Health and Consumer Affairs (EPSCO) Council adopted conclusions on innovation in the medical device sector. These conclusions were prepared as a follow-up to the high level conference on innovation in medical technology held in Brussels, on 22 March 2011. The conclusions call upon Member States and the Commission to take initiatives to promote innovative and userfriendly medical devices that focus on improving the health of patients.

The Council also discussed the recast of the Medical Devices Directives and has prepared a list of considerations inviting the Commission to take those into account in the course of its future legislative work. The Council mentioned the possibility of introducing a system to improve the traceability of devices, and suggested that a clarification was necessary regarding the definition of medical devices and the criteria for their classification. The Council also called for a stronger coordination with international partners to ensure that medical devices are manufactured according to high safety requirements worldwide.

The EPSCO Council also adopted conclusions towards modern, responsive and sustainable health systems. Member States were invited to use the EU financial programmes, highlighting the European Structural

Funds, to boost health system innovation and to contribute to reducing health inequalities. The Commission was invited to support Member States in initiating and implementing a reflection process aimed at identifying effective ways of investing in health, so as to pursue modern, responsive and sustainable health systems.

HEALTH WORKFORCE AND PROFESSIONAL MOBILITY SEMINAR

On 31 May 2011, Antonyia Parvanova MEP organised a seminar to address the health workforce challenges in the EU and discuss the need for a coordinated response in this matter, particularly the need to plan, train, attract and retain skilled health professionals in order to meet the future healthcare needs. The Commission informed the participants about preparations for the EU Action Plan and the Joint Action on Health Workforce Planning, both planned for 2012.

JOINT ACTION ON HEALTH WORKFORCE PLANNING

On 22 June 2011, the first formal preparatory meeting of the future Joint Action on Health Workforce Planning will be held in Brussels. The meeting's objective is to agree on the key areas of work within the Joint Action and choose a lead Member State. The CED was invited, along with other stakeholder organisations, to attend this meeting.

JOINT ACTION ON PATIENT SAFETY AND QUALITY OF CARE

The application for the Joint Action was submitted to the Executive Agency for Health and Consumers in late May 2011. The Joint Action is expected to start in late 2011 or in early 2012. The overall aim of the Action is to create a permanent platform for future cooperation between Member States in the area of patient safety and quality of care and facilitate the sharing of good practices. The CED will participate as an associated partner.

EU HEALTH POLICY FORUM (EUHPF)

A meeting of the EUHPF took place on 19 May 2011. The group discussed its

future work and activities, including the European Innovation Partnership on Active and Healthy Ageing within the EU 2020 strategy, the implementation of the Health Strategy and the future EU Health Programme.

According to the Commission, the main concern of the Health Programme should be to help Member States in tackling the problems related to the sustainability of health systems and to support innovative solutions in health, prevention and with EU legislation.

EUROPEAN YEAR FOR ACTIVE AGEING (2012)

On 17 June 2011, the EPSCO council adopted conclusions to designate 2012 as the European Year for active ageing and solidarity between generations. The purpose is to enable local authorities, social partners and civil society organisations, which have a role in promoting active ageing, to plan campaigns and activities around this theme. This had been a proposal from the Commission due to the significant concern about the ageing of the European population.

FLUORIDATION OF DRINKING WATER

The Scientific Committee on Health and Environmental Risks' (SCHER) discussed the preliminary opinion on the Fluoridation of Drinking Water at its 30 March 2011 plenary meeting and decided to adopt the opinion via written procedure. Some changes to the wording used in the opinion were still expected. The opinion is expected to be published soon.

TOBACCO

On 16 June 2011, the Commission launched a new campaign to fight against tobacco called "Ex-smokers are unstoppable". The campaign aims to highlight what smokers can gain from quitting smoking, and uses ex-smokers and their achievements as role models to inspire those who wish to quit. The campaign further provides smokers with practical help with quitting, through the innovative "iCoach".

SECTION 2

GENERAL EU POLICY

POLISH PRESIDENCY PRIORITIES

The Polish EU Presidency (July – December 2011) announced two main priorities in health:

- Closing the gap in the health status of the EU's population: a Ministerial conference is planned for 7-8 November, in Poznan, Poland;
- Prevention and treatment of brain diseases: 3 expert conferences are expected and the first one is already scheduled for 18 November, in Warsaw, on the occasion of the 1st EU Brain Day.

EU STANDARDISATION PACKAGE

On 1 June 2011, the European Commission published a communication and a proposal for a regulation on the European standardisation. In line with the Europe 2020 Strategy and the Single Market Act, the proposal is aimed at accelerating, simplifying and modernising the European standardisation system.

If adopted, the regulation would now also relate to the development of standards for services at EU level. While healthcare was excluded from the Services Directive, the new regulation could signal a new attempt to bring also activities of healthcare professionals such as dentists under the services umbrella. Currently, European standards are developed by standardisation bodies such as CEN at the request of stakeholders. ^{DE}

Comments, questions and contributions please contact: ced@eudental.eu

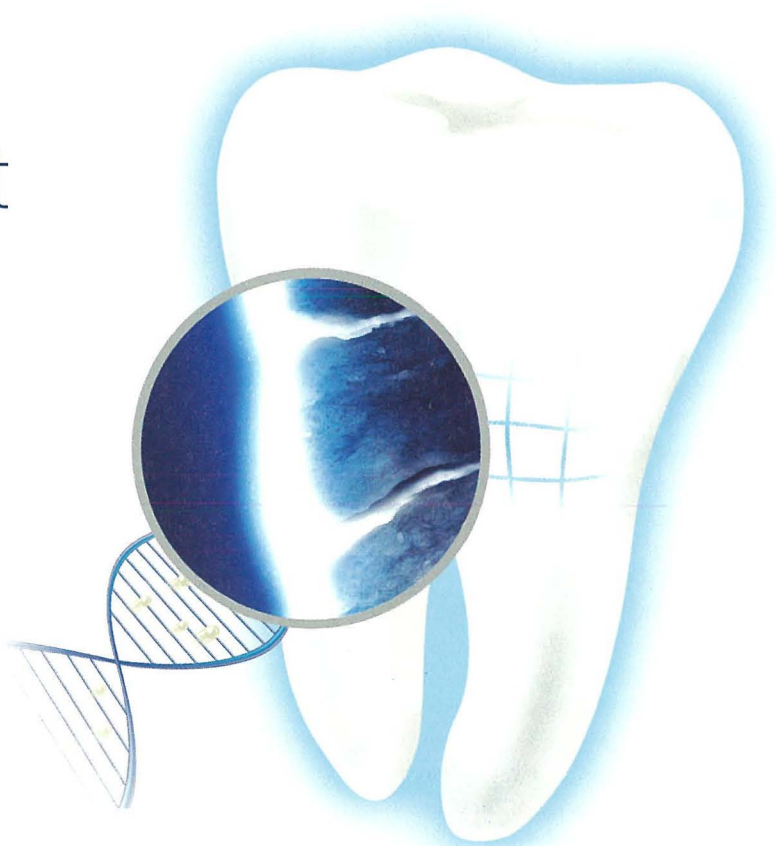
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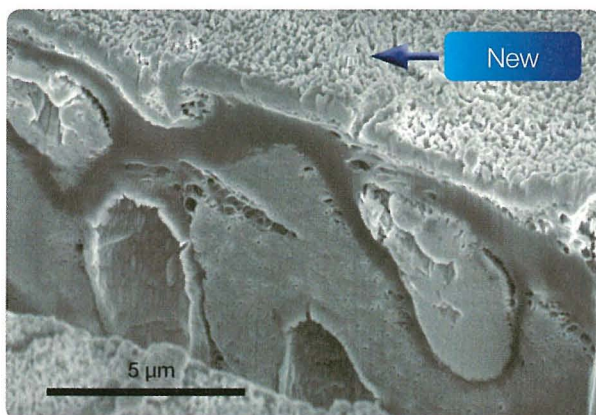
Now there's a major advance to help you meet the challenge of dentine hypersensitivity. Announcing the arrival of Sensodyne Repair & Protect, a management option that moves with the times.

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For years, desensitising toothpastes have only treated dentine hypersensitivity. Now the debate is moving on: how can we go further than just treating the pain, to give patients continuous repair and substantive daily protection?



Formation of hydroxyapatite-like layer on dentine surface



Hydroxyapatite-like layer of 3–7µm after 5 days

In vitro cross-section Scanning Electron Microscope (SEM) image of hydroxyapatite-like layer formed by supersaturated NovaMin® solution in artificial saliva after 5 days (no brushing)¹

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This layer formed by Sensodyne Repair & Protect starts to form from the first use,^{2,3,6,8} and can withstand daily oral challenges such as toothbrushing and acidic food and drinks.^{2,5,6,9}

In this way, it can help provide your patients with continual protection from the pain of dentine hypersensitivity with twice-daily brushing.¹⁰⁻¹²

Welcome to the new
science of Sensodyne
Repair & Protect



Specialist in dentine hypersensitivity management

INTERNAL BLEACHING

Case reports by Dr M. K. Vasant MBE MGDS.RCS (Eng) MGDS RCS(Edin) FFGDP(UK) FDS RCS(Edin)

There are various methods of internal tooth whitening which include use of various strengths of hydrogen peroxide (Superexol), sodium perborate (Bocasan) or carbamide peroxide with or without the use of heat and/or light.

Another variable is the length of time the agent is applied for i.e. walk in method or simply the chairside application and the number of visits carried out.

It may be unviable to carry out several visits of internal bleaching. If definitive restorations such as porcelain veneers are planned it is often better to wait 6 months

for the result to stabilise so correct shade can be chosen. Bonding may also be compromised if this is carried out within six weeks of application of bleaching. The oldest technique probably includes the use of 30% - 35 % (100-130 volumes) of hydrogen peroxide.

Whilst the efficacy of this method is undoubted, there remains a problem with handling of this liquid which can cause a serious burn to the adjacent oral mucosa as it is impossible to control and contain the liquid to the access cavity. In order to facilitate application, "carriers" for the hydrogen peroxide are commercially available.

These are rather expensive whilst the actual liquid (hydrogen peroxide) is rather inexpensive. Essentially, the so called "carrier" is talc.

Whilst one could use the talc that is readily available in talcum powder to convert the hydrogen peroxide to a convenient gel form, I have found a novel way to do this.

This is achieved by quite simply mixing a drop of 30 % hydrogen peroxide using 10 % carbamide peroxide (bleaching gel) from any manufacturer in a dappen dish.

Continues on page 9



Fig 1 UL1 preop(EK)



Fig 3 LL1 Preop (PA)



Fig 2 UL1 post op (EK) (half an hour later - Second application could enhance the result)



Fig 4 LL2 post op bleaching (PA)
(comp restorations incisally on LR1 LL1)



Fig 5 Competed PVs at LR1 LL1 6 months later



Fig 6 Gel (CP mixed with Hydrogen Peroxide)



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INTERNAL BLEACHING

Continues from page 7

TECHNIQUE SUMMARY:

1. Remove gutta percha to a level about 1-2 mm below the CEJ. Remove any carious or heavily stained dentin.
2. Use radiopaque glass ionomer (e.g. Fuji 9) to seal the GP point.
3. Apply rubber dam.
4. Mix 10 % CP with one or two drops of 30 % Hydrogen Peroxide
5. Carry this into the access cavity and

externally (inside/outside bleaching) with a suitable instrument

6. Heat an old instrument red hot in an open flame and carry it into the access cavity. The gel will start bubbling almost immediately showing a colour change. Repeat this 7- 10 times renewing the gel if necessary.
7. Fill the access cavity with GLC or composite as required
8. You could repeat this procedure within a few weeks or months

if necessary or combine it with walk in bleach technique

FURTHER READING AND CONTACTS:

1. *Text Book Bleaching Techniques in Restorative Dentistry*. Linda Greenwall. Price. £85.00. ISBN. 9781853177729. ISBN-10: 1853177725.
2. *Hydrogen Peroxide 100* volume is available from John Bell & Croyden, 50-54 Wigmore Street, London W1U 2AU. Telephone: 020 7935 5555. 



Fig 7 Hydrogen peroxide 100 vol



Fig 8 Applying on labial surface

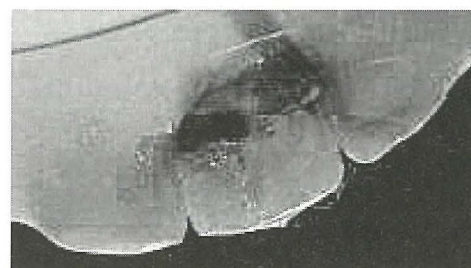


Fig 9 Applying in the access cavity



Fig 10 Before (RB)

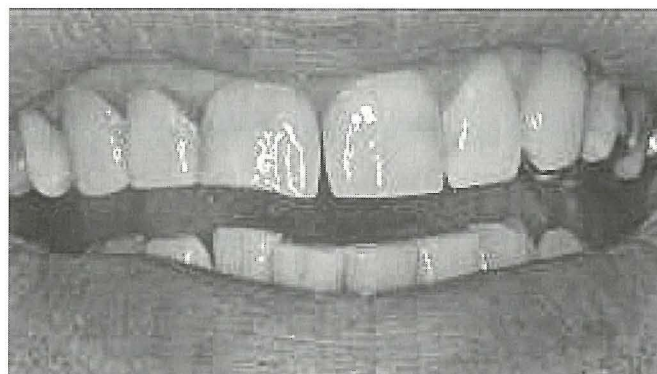


Fig 11 After (RB)

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PATHFILE™

A new rotary Nickel Titanium system for quick and safe pre-flaring.

Berutti E MD DDS*, Cantatore G MD DDS**, Castellucci A MD DDS***.

Rotary NiTi instruments have revolutionised endodontics, allowing even the less experienced dentist to create perfectly truncated-conical shaping in harmony with the original anatomy. However, in clinical practice these instruments risk breaking if excessive strain accumulates.

Strain is the result of two stresses: flexural stress and torsional stress¹⁻². Flexural stresses are probably those most responsible for the breakage of rotary NiTi instruments and as they are produced by the original anatomy of the root canal, the dentist can do little to reduce them³⁻⁴.

If torsional stresses exceed the elastic limit of the NiTi alloy, they produce plastic deformation of the instrument, which immediately breaks². The dentist's dexterity and the instrumentation technique used are of primary importance in preventing the excessive accumulation of torsional stresses. Three main factors are responsible for torsional stresses: excessive pressure on the hand-piece⁵; excessive instrument-blade-to-canal-wall contact area⁶⁻⁷.

The third factor comes into play when the canal section is smaller than the tip of the instrument; this is inactive and thus incapable of cutting the dentine⁶⁻⁷ and the result is known as "taper lock" and is followed by plastic deformation and instrument breakage⁸. This can be avoided by applying correct coronal enlargement⁹⁻¹⁰ and appropriate pre-flaring. This aims to create a "glide path" before using any rotary NiTi instrument¹¹⁻¹², thus the canal must be enlarged to the foramen to a diameter greater than or at least equal to the tip of the first rotary NiTi instrument that will be used¹¹⁻¹².



Fig. 1

It is important to remember that all rotary NiTi instruments available on today's market have inactive tips that are thus not capable of cutting dentine efficaciously.

Creation of the glide path is the last manual phase of the shaping sequence. It is the most difficult, especially for the general practitioner, and is the phase in which the most serious errors can occur, that can cause the entire treatment to fail (steps, false paths, dentine plugs).

The new PathFile™ (DENTSPLY Maillefer) rotary instruments have been designed to create the glide path rapidly and in complete safety, thus eliminating the last manual phase. For the general practitioner this means avoiding possible errors, while for the expert endodontist it provides a tool with which to turn challenging cases into extremely simple ones. Before using the PathFile™ the only step required is to probe the canal to the foramen with #10 K-file. It is obvious

that with a thin and flexible K-file such as #10 it is virtually impossible, even for the less experienced dentist, to make mistakes.

The PathFile™ system comprises 3 rotary NiTi instruments, available in lengths 21, 25, and 31 mm (Fig. 1). The taper of all the instruments is .02 and the tip diameters are: PathFile™ 1 (violet) tip ISO 13, PathFile™ 2 (white) tip ISO 16, PathFile™ 3 (yellow) tip ISO 19.

The most significant features of these revolutionary new instruments are as follows:

STRENGTH

The great strength is due to the square section and the very slight taper, only .02. The square section, which is easy to manufacture, has long been tested successfully for application to endodontic instruments, for example the K-files. The .02 taper ensures great resistance to cyclic fatigue, which is indispensable in the early phase

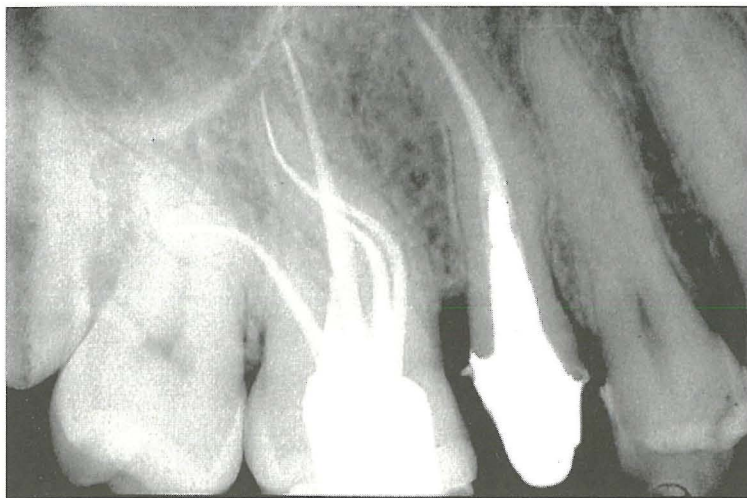


Fig. 2



Fig. 3

of treatment when the canal curves are still virgin^{13, 14, 15, and 16.}

FLEXIBILITY

Flexibility is ensured by the NiTi alloy as well as by the taper of .02. This enables the original anatomy to be followed and maintained during the delicate phase of creating the glide path (Fig. 2). It also avoids the inexperienced general practitioner having to use the rigid steel K-files that are frequently the source of errors, including irreparable ones such as steps, false paths, dentine plugs and transportation of the canal and of the apical foramen (Fig. 3, 4).

SAFETY

The working length is undoubtedly one of the most important aspects of the entire endodontic treatment. In the early phases the working length may change as the canal is enlarged and in consequence the radius of the curves is increased. The PathFiles™ are instruments that forgive these initial errors since

they have the advantage of not creating steps if the working length is too short, and of not causing transportation of the foramen if the working length is too long (Fig. 5).

EFFICIENCY

The efficiency is given by the instrument's four blades, which provide optimal cutting capability. This enables the PathFiles™ to be used at a speed of 300 rpm, and a very high torque value, in the range 5-6 Ncm (maximum torque available with the X-Smart™ endodontic engine, DENTSPLY Maillefer).

SIMPLICITY OF USE

The enormous advantage that the PathFiles™ possess is that they only require the dentist to probe the canal to the foramen with a #10 K-file before use. It is intuitively obvious that with such a thin and flexible hand instrument it will almost always be possible to reach the end of the canal without difficulty. Even the least expert general practitioner can thus eliminate

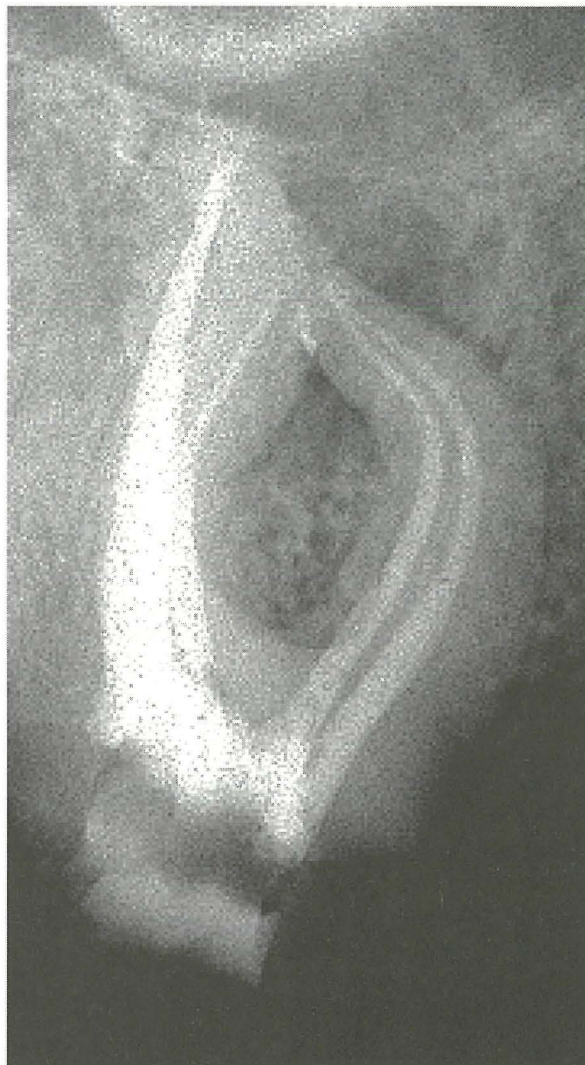


Fig. 4

the last manual phase, in which training and skill in using endodontic instruments is fundamental to avoid errors which can be irreparable (Fig. 6, 7). The PathFiles™ will provide the expert endodontist with trustworthy friends capable of transforming a complex endodontic anatomy into a simple case that can be treated almost entirely with rotary NiTi instruments.

The PathFiles™ were subjected to trials to evaluate their efficacy as soon as they were made available. The research by Berutti, Cantatore, Castellucci and co-workers, recently published in the Journal of Endodontics¹⁷ is one such significant study.

The study compared changes to canal curvature and incidence of canal aberrations after preflaring with hand K-files or with nickel-titanium rotary PathFiles™, in S-shape Endo Training Blocks.

Continues on page 12

PATHFILE™

A new rotary Nickel Titanium system for quick and safe pre-flaring.

Continues from page 11

The influence of the operator's expertise was also investigated. One hundred training blocks were coloured with ink and pre-instrumentation images were acquired digitally.

Preflaring was performed by an endodontist with PathFile (group 1) and with hand stainless steel K-files #10-15-20 (group 2); an inexperienced clinician performed preflaring with PathFile (group 3) and with hand stainless steel K-files (group 4). Pre-instrumentation and post-instrumentation images were superimposed to evaluate the outcomes investigated (Fig. 8).

The mean radius of curvature pre- and post-instrumentation for each sample was measured. The variation of the radius of curvature is a significant parameter to verify the instrumentation's ability to maintain the original anatomy. To avoid measurement mistakes, the percentage of increase between pre- and post-instrumentation radii was calculated. A high percentage means a significant alteration of the original anatomy, whereas a low percentage means a shape in harmony with the original anatomy.

Differences in canal curvature modification and incidence of canal aberration were analysed with the Kruskal-Wallis plus post

hoc tests and by the Monte Carlo method, respectively ($P < .05$). The PathFile™ groups demonstrated significantly less modification of curvature ($P < .001$) and fewer canal aberrations ($P < .001$). No expertise-related difference was found within instrument groups ($P > .05$), whereas the inexperienced clinician produced more conservative shaping with Pathfiles™ than did the expert with manual preflaring ($P < .01$).

At the last National Congress of the S.I.E. (Italian Endodontics Society) which was held in Turin, Italy on 13-15 Nov. 2008, Greco and Cantatore presented an interesting study that evaluated in vitro "the difference in

penetration ability of radiopaque irrigant solutions between a pre-flaring method with conventional hand stainless steel instruments (steel K-files # 10, 15 and 20) and rotary instruments in NiTi (PathFiles™)"18.

The results showed a statistically significant difference in the penetration of the irrigant in the middle and apical thirds of the canal using the first two PathFiles™ compared to manual instrumentation with steel K-files # 10 and 15. The significance disappeared with the last and largest instruments: PathFile™ 3 and steel K-file # 20.

Continues on page 15



Fig. 5



Fig. 6



Fig. 7

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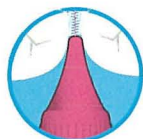
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A new rotary Nickel Titanium system for quick and safe pre-flaring.

Continues from page 12

The authors of the study concluded that mechanical pre-flaring would appear to facilitate the flow of the irrigant solution compared to the use of hand stainless steel K-files.

This research throws light on a new characteristic of the PathFiles™: their ability to remove the content of the root canal together with the detritus produced while working. This highly important characteristic is common to all rotary NiTi instruments and is also responsible for the almost complete lack of extrusion of detritus beyond the apex while using the PathFiles. It should be remembered that the PathFiles™ are used after having probed the canal only with a K-file # 10. With this hand file it is almost impossible to create periapical problems.

By eliminating this last manual phase, using the PathFiles™ to create the glide path, post-operative pain can also be reduced. Thus two goals are achieved: greater comfort for the patient and the possibility of performing treatment in a single session, which has been shown to carry a higher success rate¹⁹. In this connection, Berutti, Castellucci, Cantatore and co-workers have

begun a study to verify the incidence of post-operative pain in patients after the glide path has been created with PathFiles™ vs. manual stainless steel K-files. Statistical significance has not yet been achieved, probably because the series is still very small at this early stage of the study, but the trend is towards a lower incidence of post-operative pain in patients in whom the PathFiles™ are used.²⁰

It may be concluded that PathFiles™, the new rotary NiTi instruments, open up a new era in the instrumentation of root canals enabling the glide path to be created easily and safely including by the less expert general practitioner. They are also a valid help to the expert endodontist who, by using PathFiles™, can easily treat even a complex canal anatomy.

ABSTRACT

Rotary NiTi instruments have revolutionised endodontics, enabling even the less expert dentist to perfectly and speedily shape the root canal in harmony with the original anatomy. All the NiTi rotary systems available today consist of instruments whose tip is relatively inactive, a design feature whose aim is to avoid drawbacks

such as steps, false paths or foramen transportation. Thus an initial manual phase is indispensable to enlarge the canal at least to the size of the tip of the first rotary NiTi instrument that will be used. This pre-flaring is fundamental to avoid torsional breakage of the rotary NiTi instruments. This last manual phase, for which stainless steel K-files are used, is the most difficult and delicate stage of the entire treatment and one in which errors, sometime irreparable ones, can easily be made.

The new rotary NiTi instruments PathFile (DENTSPLY Maillefer) have been designed so that pre-flaring can be achieved in a few seconds and in absolute safety, creating the so-called glide path, before using any type of rotary NiTi system. The PathFile system consists of three rotary NiTi instruments with the following characteristics:

Taper: .02
Lengths available: 21, 25, 31 mm
PathFile 1 (violet) tip 13
PathFile 2 (white) tip 16
PathFile 3 (yellow) tip 19
Endodontic engine setting: 300 rpm.
Torque range: 5-6 N/cm

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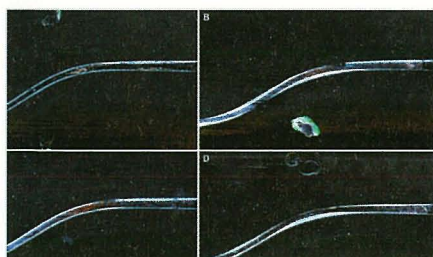
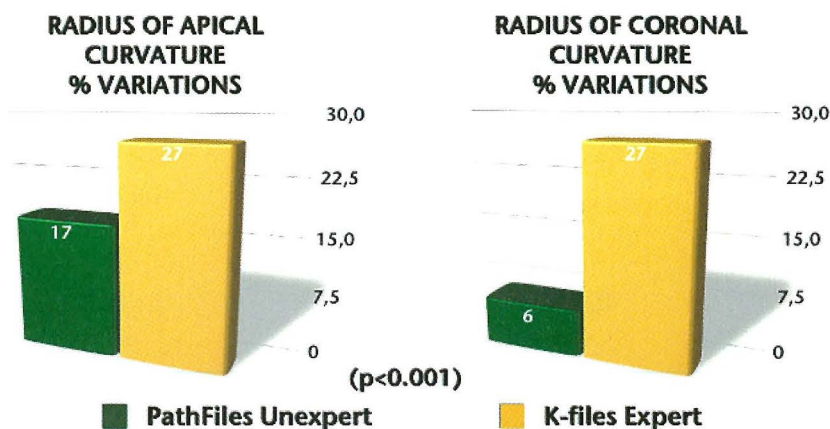


Fig. 8



Fig. 10

PERCENTAGE VARIATIONS OF THE APICAL AND CORONAL RADII



Kruskall-Wallis test and Mann-Whitney U test for multiple comparisons(p<0.05)

Fig. 9

PATHFILE™

A new rotary Nickel Titanium system for quick and safe pre-flaring.

Continues from page 15

Before using the PathFiles it is only necessary to check that the canal is passable with a K-file # 08 or # 10. Clearly with thin hand instruments such as a K-file # 10 it is impossible even for the least expert dentist to make mistakes.

For more information of Pathfiles™, or to place an order, please contact your local DENTSPLY dealer or representative.

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**Cantatore Giuseppe MD DDS: Associate Professor of Endodontics, Verona University, Italy 0039065135082 E-mail cantatore@mac.com

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LEGENDS

Fig 1: PathFile™ NiTi rotary instruments (DENTSPLY Maillefer). PathFile™ 1 (violet) tip, PathFile™ 2 (white) tip 16, PathFile™ 3 (yellow) tip 19, taper .02. Endodontic engine setting: 300 rpm, torque 5-6 N/cm.

Fig 2: Endodontic treatment of tooth 16. The PathFiles™ produce perfect pre-flaring in a few seconds, in harmony

with the endodontic anatomy including in very difficult cases like this one.

Fig 3: Creating the glide path in the 2 mesio-vestibular canals of tooth 16 using steel K-files would have been very difficult, if not impossible. The risk of making irreparable errors such as steps, stripping, dentine plugs or foramen transportation is very high even for an expert endodontist, when tackling such difficult anatomy. The PathFiles™ were determinant in solving the case.

Fig 4: Treating tooth 16 endodontically. In this case to the PathFiles™ were found to be determinant for success.

Fig 5: Treating tooth 16 endodontically. Note the 90° curvature in the apical third of the disto-buccal canal is perfectly maintained. PathFiles™ are at present the only instruments capable of creating the glide path in such complex anatomies rapidly and without risk because, before use, they only require the canal to be probed to the apex with a K-file # 08 or # 10.

Fig 6: Treating tooth 27 endodontically. The double curvature of the mesio-vestibular canal was perfectly conserved.

Fig 7: Treating teeth 26 and 27 endodontically. The use of hand stainless steel K-files up to # 20 to create the glide path in such complex anatomies carried a risk of altering the original anatomy that

could have serious consequences. On the contrary, in a few seconds Pathfiles™ have prepared the canal for the subsequent rotary NiTi instruments that, with their increased taper, completed the shaping.

Fig 8: Superimposition of pre-instrumentation and post-instrumentation images (plastic blocks). (A) Group 1, PathFile™/expert; (B) Group 2 K-files/expert; (C) Group 3, PathFile™/inexpert; (D) Group 4 K-files/inexpert.

Fig 9: Percentage variations of the apical and coronal radii. Using PathFiles™ an inexpert operator can maintain the original anatomy better than an expert operator using hand stainless steel K-files.

Fig 10: Penetration of the radiopaque irrigant into the canals of two mandibular molars after probing with a K-file 10 (left) and with a PathFile™ 1 (right). After the PathFile™ 1 the irrigant has already reached the apical third of all the canals.

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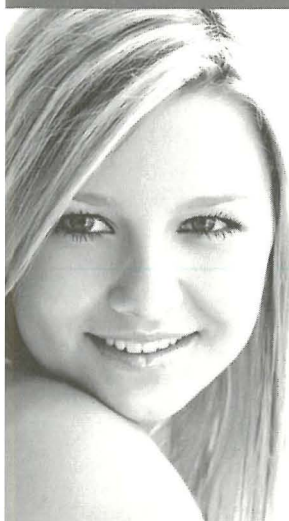
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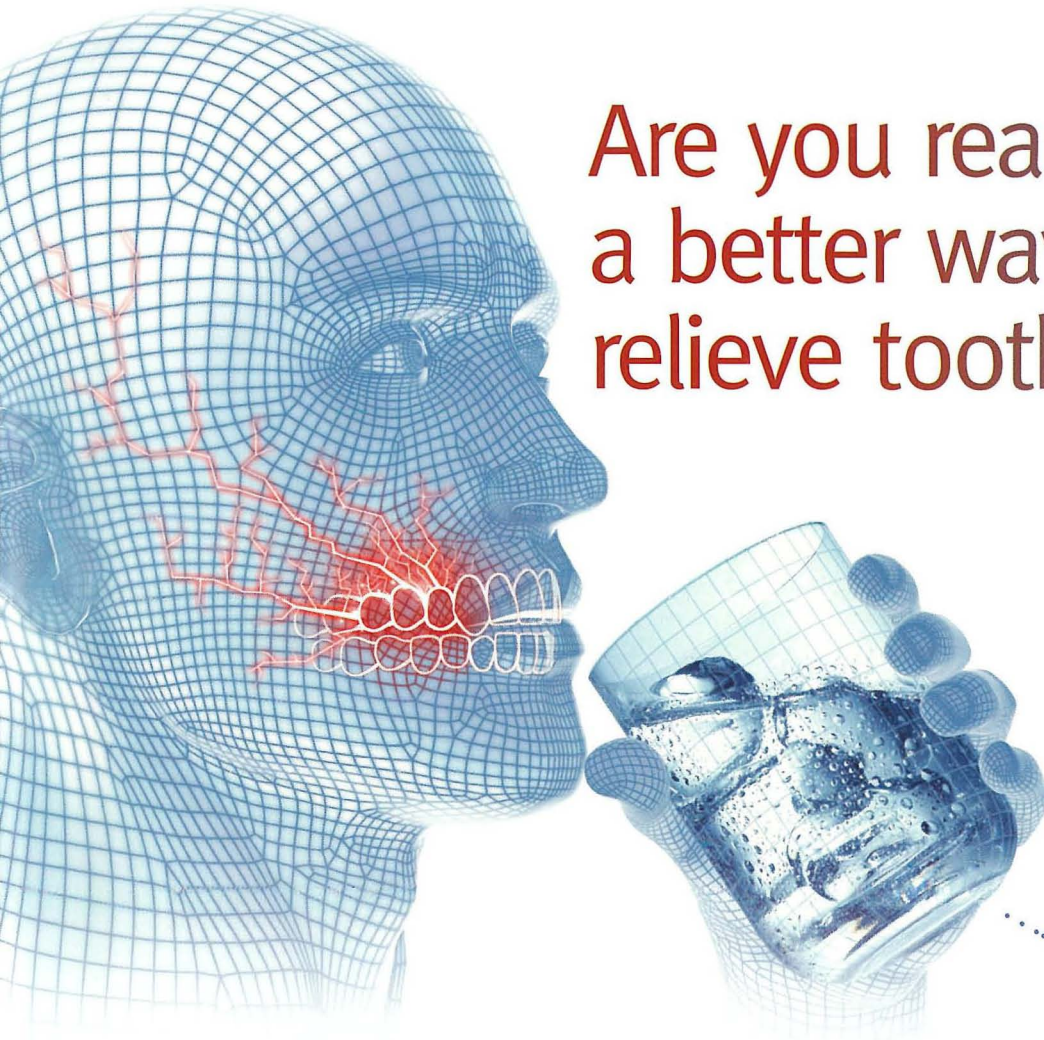
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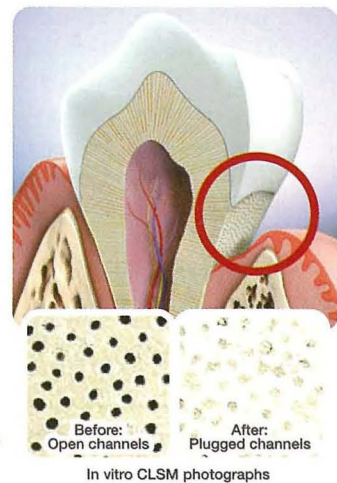
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OVERWEIGHT

HOW TO LOSE WEIGHT, BY DR CHARLES CORNEY

Based on a personal experience of running a slimming clinic

DEFINITION

Rather than relying on weight and body mass index measurements, a more medically significant measurement is the waist circumference. If it is over 1 yard [36 inches or 90cm] in women, or over 1 metre [39 inches] in men then there is too much fat in the abdomen which medically is more significant than fat elsewhere, eg the hips.

CAUSES

May occur singly or together

- Too much carbohydrate triggers insulin to convert the excess sugar in the blood to fat which is deposited in the abdomen [carb belly], also raising cholesterol.
- Too much transfat [synthetic fat or lard] deposits fat [lard belly] and raises cholesterol.
- Skipping some meals stops normal fat burn off so fat is stored [fasting belly]—contrary to popular belief.

THE BAD FOODS

- An excess of carbohydrate and transfat combination is present in
 - takeaways and processed food from the supermarket
 - fried and baked food
 - bought cakes and biscuits
 - a fried Mars Bar in Glasgow—a local 'delicacy'!
- An excess of carbohydrate alone is present in
 - cake, cream, chocolate, crisps, chips, cereal [6 Cs]
 - pastas, pasties, pastries, pizzas, pies, puddings [6 Ps]
 - sweets, sugar, sugary drinks, including milk & alcohol [3 Ss]

EFFECTS

The presence of excessive abdominal fat causes the secretion of several chemicals—

1. Angiotensin causing high blood pressure with salt retention accelerating premature arterial ageing leading to increased risk of heart attack and stroke.
2. Adipocytokine causing more fat deposition in the abdomen leading to further weight gain despite eating

wisely. This is because the cells of the body are rendered insulin resistant leading to their inability to use glucose. Consequently both blood glucose and insulin levels are elevated. This condition is called the metabolic syndrome which progresses to diabetes type II. The extra fat spreads into the liver to produce a non-alcoholic cirrhosis.

3. Oestrogen adding to the oestrogen from the ovaries and adrenal glands causing oestrogen dominance with low progesterone risking cancer [especially breast], and premature arterial ageing risking heart attack and stroke.
4. A cytokine which increases clotting factors risking heart attack, stroke and deep venous thrombosis.
5. A cytokine which reduces immunity leading to increased risk of infections anywhere in the body—especially the teeth acting as a focus spreading infection to the coronary arteries risking heart attack.

As the abdominal fat increases, increasing resistance and irreversibility to treatment occurs. Other complications include osteoarthritis of the weight bearing joints and sleep apnoea.

MANAGEMENT STRESS

Hippocrates, the Greek physician in 400BC, suggested a treatment for stress when he wrote Let food be thy medicine. This treatment in today's world of increased stress is unfortunately the cause of obesity. Therefore the patient's stress must be addressed so that the bad food can be replaced by good food, as below. A better quotation to remember is Moliere's One should eat to live, not live to eat.

EAT WELL NOT LESS

Very simple

- 3 meals per day
 - 2 minor meals of any food type.
 - main meal should consist of

about 6oz [150g] of protein plus vegetables but no carbohydrates and no trans fats [see lists above].

- restrict
- cereal to breakfast
- bread to 2 slices per day with minor meals only
- milk sufficient for milking tea or coffee only
- alcohol to 2 glasses per day – but exclude beer
- buying or eating / drinking anything with a label of over 10g of carbohydrate per 100g of food over 10ml of carbohydrate per 100 ml of fluid

Fillers between meals and add ons: fruit / fromage fraise / yoghurt / ham slices / sugar free jelly / crisp bread

FACTS AND MYTHS


- eating late does not put on weight
- natural fat does not cause fat
- synthetic fat [transfat—lard] causes fat
- glucose and lactose cause fat but fructose in fruit does not
- fructose drinks may contain added glucose which is fattening
- fat free is fattening because carbohydrate is added
- protein satisfies hunger and does not cause fat because it splits fat
- eggs do not cause high cholesterol
- transfat and / or excessive carbohydrate can cause high cholesterol

EXERCISE

A 30 minute walk per day is all that is needed.

RESULT

The patient will feel fitter with 1-2lb [1/2-1kg] weekly weight loss.

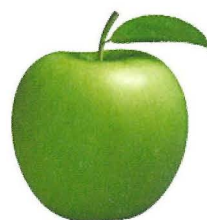
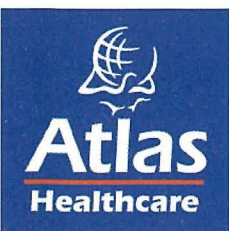
If the weight does not drop after a month, consider 'cheating', hypothyroidism, diabetes mellitus type II, oestrogen dominance—low progesterone conditions [eg polycystic ovary syndrome, The Pill, HRT] and certain psychotropic drugs. 



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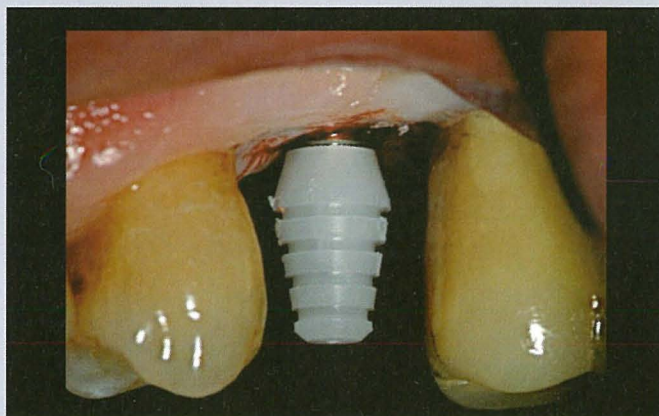
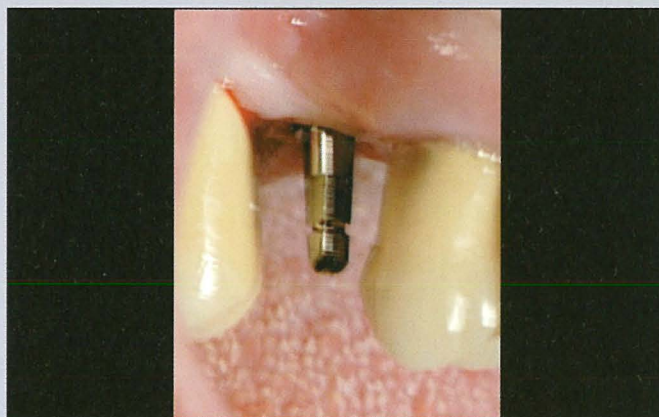
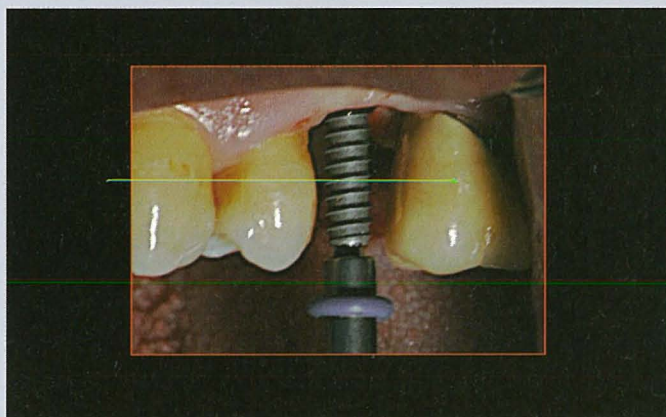
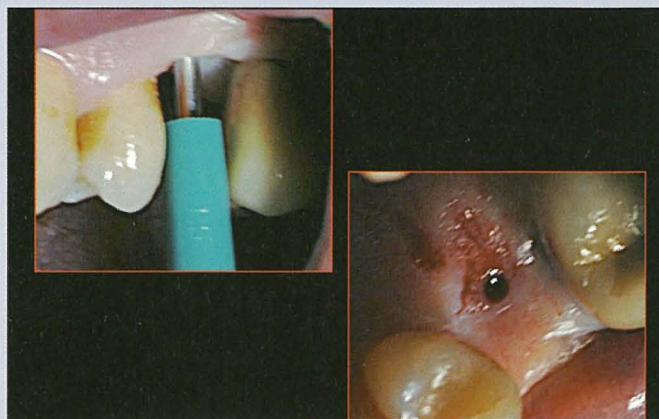
FLAPLESS SURGERY AND ITS EFFECTS

Dr. Medic. Stom. Hen

Associate Professor Univ. Iasi • Private Practice, Baden Baden Germany • Speciality: Implantology, Periodontology
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Nadine Brodala, DDS, MS, Dr Med Dent1*

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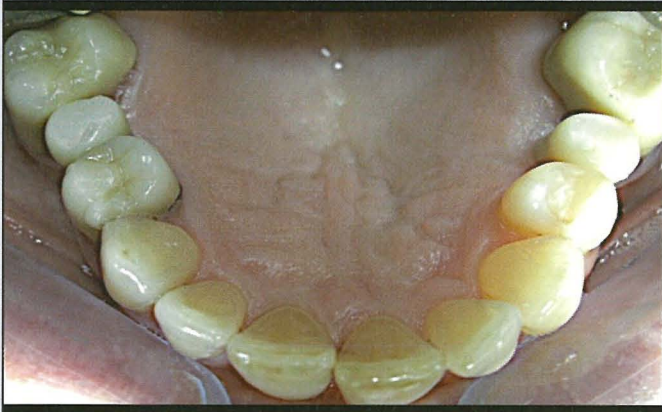


ON DENTAL IMPLANT OUTCOMES

riette Lerner (DDS)

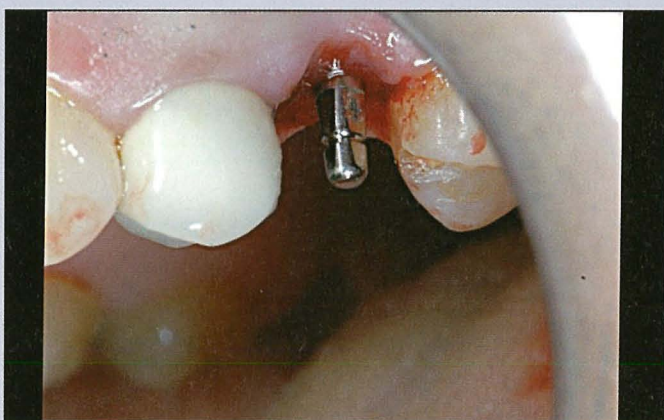
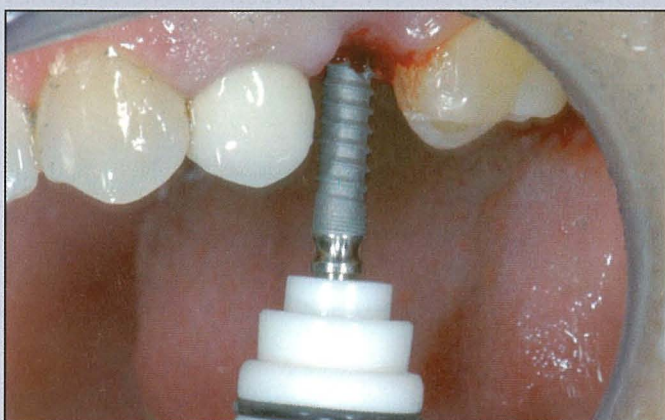
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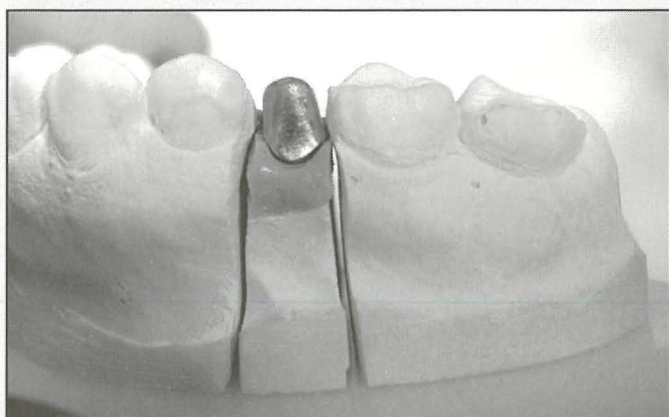
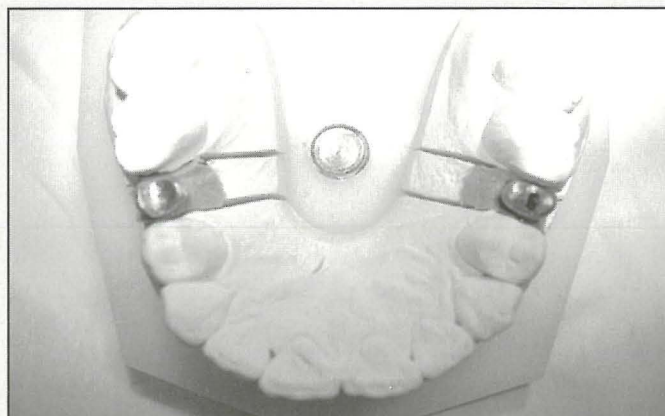
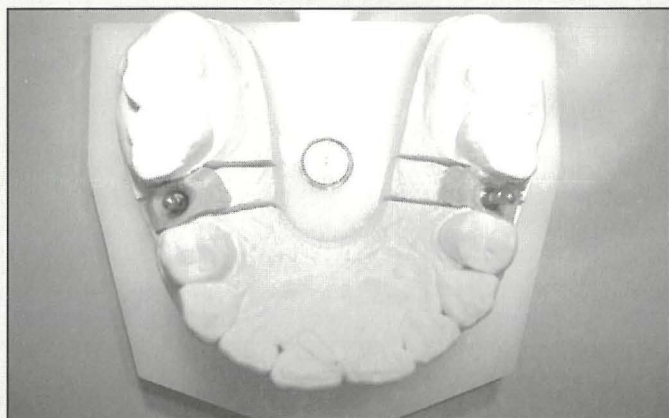
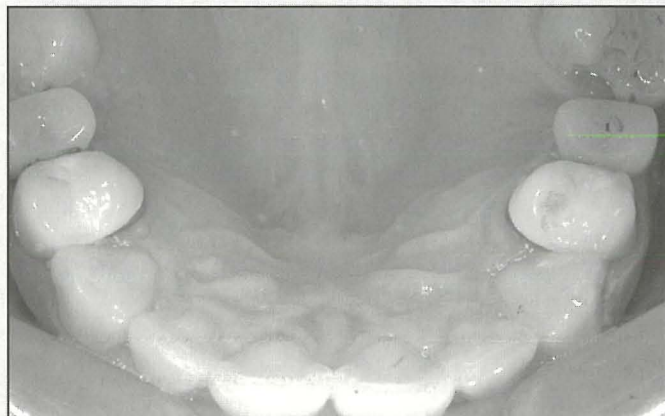
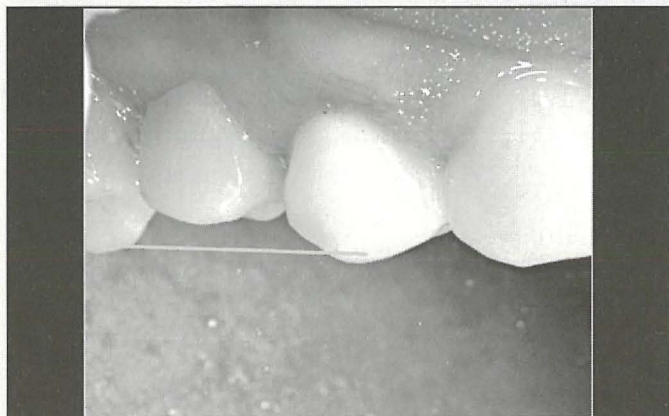
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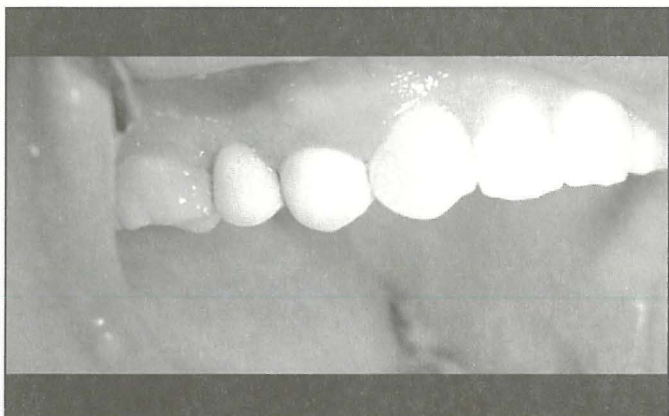
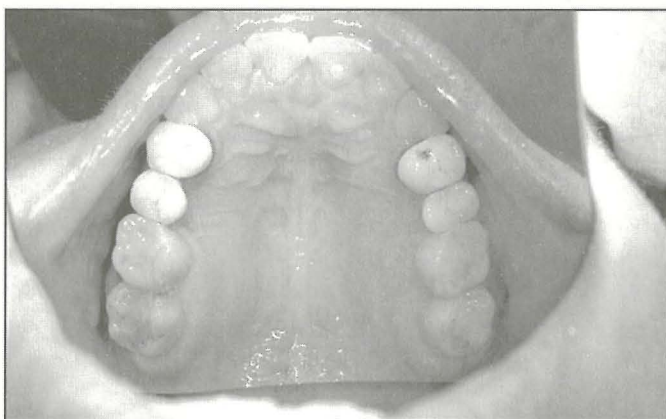
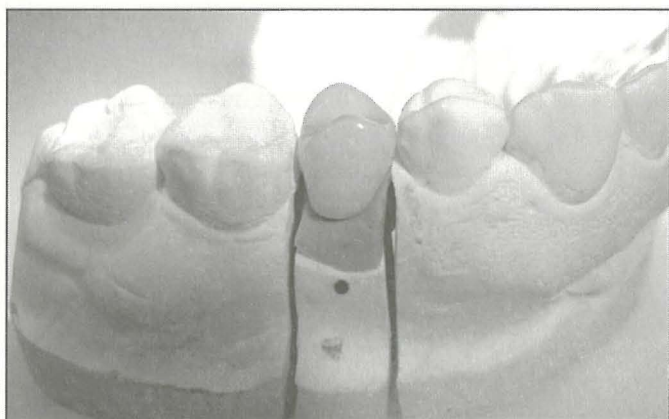
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PERIODONTAL

IS IT ABOUT TOOTH AND N

M. K. Vasant MBE MGDS.RCS (Eng) MGDS RCS(Edin) FFGDP(UK) FDS RCS(Edin)

examines the evidence that strongly associates periodontal disease with systemic conditions.

At the beginning of the 20th century, medicine and dentistry were searching for reasons to explain why individuals were afflicted with systemic disease. In the absence of much research or insight, it was two eminent individuals, Willoughby Miller and William Hunter, that found oral bacteria and infection were likely causes of most systemic illnesses. The theory of 'focal infection' developed and prospered for the next 40 years.

However, by the 1940s and 50s clinicians began to question this philosophy that led to an era of retreat until about 1989 when it resurfaced with vengeance.

Literature, which has been published since the 1990s, suggests that periodontitis may be a risk for certain systemic conditions such as cardiovascular disease, adverse pregnancy outcomes, diabetes mellitus, and pulmonary disease. Collectively, the findings gathered from investigators worldwide are very compelling, and it would appear that periodontal disease is strongly associated with systemic conditions.

Based on current literature, responsible health workers would wish to, quite rightly, address the following question:

'Do I recommend a patient with historical or on going periodontal disease regular and frequent scaling visits in order to reduce or prevent the risk of systemic diseases (rather than merely controlling the periodontal condition)?'

Let us examine the evidence gathered thus far.

PERIODONTITIS AS A RISK FACTOR FOR CARDIOVASCULAR DISEASE

In 1989, Kimmo Mattila and co-workers conducted a case control study on patients who had suffered myocardial infection. Mattila and co-workers reported a highly significant association between poor dental health and acute myocardial infarction. The association was independent of other risk factors for heart attack, such as age, total cholesterol, high-density lipoprotein (HDL), triglycerides, C peptide, hypertension, diabetes, and smoking (Mattila et al, 1989).

Scannapieco and colleagues (2003a) conducted a systemic review of evidence supporting or refuting any relationship, in response to the focused question: 'does periodontal disease influence the initiation/progression of atherosclerosis and therefore cardiovascular disease, stroke and peripheral vascular disease?' Having looked at 31 studies they noted (not absolute) consistency and concluded 'periodontal disease may be moderately associated with atherosclerosis, myocardial infarction and cardiovascular events'.

An accompanying consensus report by the American Academy of Periodontology recommends 'patients and health care providers should be informed that periodontal intervention may prevent the onset or progression of atherosclerosis induced diseases'.

A responsible clinician should ask if you treat periodontitis, do you prevent the onset or reduce severity of these systemic complications?

This is not an easy task and some studies will take a considerable time before we know the answer. However,

whilst the effects of periodontal therapy on cardiovascular disease events in patients have yet to be determined, the available pilot data suggest that periodontal therapies can improve the surrogate cardiovascular outcomes like biomarkers and endothelial functions. Students and clinicians who are astute in 'critical reading or thinking' will appreciate that surrogate outcomes (i.e. chemical values) may not necessarily be true measures of diseases, although they might be good indicators and true in many cases.

BIOLOGIC RATIONALE

Scientists have noted that a patient who has, for example, 28 teeth with pocket depths of 6-7mm and bone loss has a large overall surface area of infection and inflammation (Waite and Bradley, 1965). In patients with moderate periodontitis, the surface area could be the size of a palm of a hand or larger. In addition, the sub gingival area in the periodontal pockets exists in highly organised biofilm. Since periodontal infections result in low-grade bacteremias and endotoxemias in affected patients (Sconyers et al, 1973; Silver et al, 1980), systemic effects on vascular physiology via these exposures appear biologically plausible.

PERIODONTITIS AS A RISK FACTOR FOR ADVERSE PREGNANCY OUTCOMES

In considering adverse pregnancy outcomes, four published intervention studies provide early evidence that preventive and treatment interventions aimed at reducing maternal periodontal infection and inflammation may reduce the likelihood of preterm low birth weight infants, whilst

DISEASE NOTHING BUT THE TOOTH?

one study did not find the effect. Overall, these clinical trials suggest that mechanical intervention in pregnant mothers with gingivitis or periodontitis can reduce the incidence of preterm low birth weight.

Pre-eclampsia is a hypertensive disorder that independently contributes to infant morbidity and mortality. Accordingly, atherosclerotic-like changes in placental tissues involving oxidative and inflammatory events is thought to initiate the development of preeclampsia (Ramos et al, 1995).

Xiong and workers (2006) have reviewed all of the existing evidence to date that examines the influence of periodontitis on pregnancy outcomes. This report concludes that more methodologically vigorous studies are needed. These studies are currently being conducted.

PERIODONTITIS AS A RISK FOR DIABETIC COMPLICATIONS

Similar to cardiovascular disease, diabetes mellitus is a common, multifactorial disease process involving genetic, environmental and behavioral risk factors.

Clinicians and investigators working with patients who have diabetes mellitus have studied whether periodontal treatment can improve glycemic control. Several studies have sought to answer this question using periodontal mechanical treatment as an intervention (Seppala, Ainamo, 1994; Aldridge et al, 1995; Smith et al, 1996; Christgau et al, 1998; Stewart et al, 2001). The results are not equivocal. Some researchers have found an improvement, while others have not. Clearly, further studies are to be done to answer this question.

In subjects with severe periodontitis, the death rate from ischaemic heart disease was 2.3 times higher than that of subjects with no or mild periodontitis after accounting for known risk factors. The death rate from diabetic neuropathy was 8.5 times higher in those with severe periodontitis. When deaths from renal and cardiac causes were analysed together, the mortality rate from cardiorenal disease was 3.5 times higher in patients with severe renal periodontitis (Saremi et al, 2005).

These findings further suggest that periodontal disease is a risk for cardiovascular and renal mortality in people with diabetes (Janket et al, 2003; Scannapieco et al, 2003a; Mealey, Rose, 2005; Saremi et al; Mealey, Oates, 2006).

What is unquestionable is that the diabetic patients have improved oral health with improvements in plaque scores.

PERIODONTITIS AS A RISK FOR RESPIRATORY INFECTIONS

There is emerging evidence that in certain at-risk populations, periodontitis and poor oral health may be associated with several respiratory conditions.

Respiratory diseases contribute to morbidity and mortality in human populations. Lower respiratory tract infections were ranked as the third most common cause of death worldwide in 1990, and chronic obstructive pulmonary disease (COPD) was ranked sixth (Scannapieco, 1999; Scannapieco et al, 2003).

There are a number of studies that examine the effect of treating oral infection in reducing the risk of pneumonia in high-risk populations.

DeRiso and colleagues (1996) studied subjects admitted to a surgical intensive care unit. When subjects received a chlorhexidine rinse twice a day compared to control subjects receiving a placebo rinse, the incidence of pneumonia was reduced 60% in the chlorhexidine treated group compared to the control group. Fourrier and colleagues (2000) found a similar 60% reduction in pneumonia with the use of a 0.2% chlorhexidine gel.


In a landmark study, Yoneyama and co-workers (2002) examined the role of supervised tooth brushing plus providone-iodine on the incidence of pneumonia in a group of elders living in nursing homes in Japan. When these subjects had their mouths cleaned, with supervision, there was a 39% reduction in pneumonia over a two-year period compared to the control group.

Recent reviews of the evidence clearly indicate that when bacterial plaque is reduced in the mouth of at-risk subjects, the risk of pneumonia is reduced. The findings are, at present, limited to populations who are in special-care.

SUMMARY

Dentistry has come a long way since it was proclaimed in 1900 that oral disease caused most systemic disease. In the 1950s we questioned and dismissed this theory. Another 40 years following this, we have come to a full circle. So, is it true that dentistry has a wider role in preserving general health? This is now the serious question.

REFERENCES

For the full list of references to accompany this article, please email siobhan.lewney@fmc.co.uk. 

Start-X™ Calcified Pulp Chamber Floor

By Drs. E.Berutti, G.Cantatore, A.Castellucci

Minimally-invasive dentistry has become the primary goal in all dental fields(1,2). In Endodontics this concept finds its application in ultrasonic instruments(3) which can be used for:

1. Access refinement, finding calcified canals and removal of attached pulp stones
2. Removal of intra-canal obstructions (separated instruments, root canal posts, silver points and fractured metal posts)
3. Increased action of irrigating solutions
4. Ultrasonic condensation of gutta-percha
5. Placement of mineral trioxide aggregate (MTA)
6. Surgical endodontics: root-end cavity preparation and refinement, and placement of root-end obturation material
7. Root canal preparation

Start-X™ tips consist of five inserts, each tip designed for a specific application, thus simple to use and aimed not only at specialised Endodontists, but above all at the general practitioner.

Other characteristics include efficiency, resistance to breakage and durability. All of the tips are fabricated with a steel alloy and have a water port; thus they can be used with or without irrigation.

All Start-X™ tips have an angle of 110° between the attachment to the handpiece and the working part. This provides perfect visibility while working in all situations. Furthermore, the cutting surface of the Start-X™ tips consists of flat micro-blades. These flat blades have three advantages:

1. Each blade has two cutting angles joined by a flat surface, which translates into optimal efficiency and precision of cut.
2. The blade is sufficiently thick, giving it remarkable resistance to wear.
3. The grooves between the blades collect debris, provide tip cooling and make the insert extremely simple to clean after use.

The Start-X™ tips are available with two different attachments: EMS and Satelec.

FINISHING OF ACCESS CAVITY

WALLS: START X™ TIP NO 1

This tip has a tapered shape; the tip of the insert is inactive and may be compared to a "Batt" bur. Therefore it is possible, in absolute safety and with great simplicity, to finish the walls of the pulp chamber even if it is highly calcified, with roof and floor almost touching. In these cases, the use of the normal "Batt" bur is impossible, because the inactive tip is considerably larger and the use of normal burs with active tips is both dangerous and invasive.

MB2 CANAL SCOUTING:

START-X™ TIP NO 2

The orifice of the MB2 lies along the line joining the mesio-buccal canal and the palatal canal. Frequently a depression, almost an isthmus, exists that starts from the mesio-buccal canal and runs towards the palatal canal and at the palatal end of this groove lies the orifice to the MB2(4). In many cases, access to this canal is hindered by a dentinal shelf that must be removed. In other cases, the MB2 has a very sharp coronal curvature, to the extent that the canal orifice is frequently close to the boundary between the wall and floor of the access cavity.

With the Start-X™ No 2, both the dentinal shelf and part of the initial sharp coronal curvature can be eliminated; the orifice to the MB2 is thus transferred onto the floor of the pulp chamber. This enables us to clearly see the canal orifice and subsequently to scout it to the apex without any problem of coronal interference.

The Start-X™ tip No 2 has a tapered shape and the tip of the insert is active. The tip must be moved back and forth along the depression that runs from the mesio-buccal canal towards the palatal canal. At the same time the tip is also pushed mesially; this also cuts

the mesial wall of the access cavity, displacing it more mesially. Thus the depression will no longer lie on the boundary between floor and lateral walls of the pulp chamber cavity, but will be situated upon a mesial extension of the pulp chamber floor that we have made by using the Start-X™ tip No 2).

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Based on the simple concept of ONE TIP – ONE CLINICAL INDICATION, each tip in the Start-X™ range offers practitioners a different benefit:

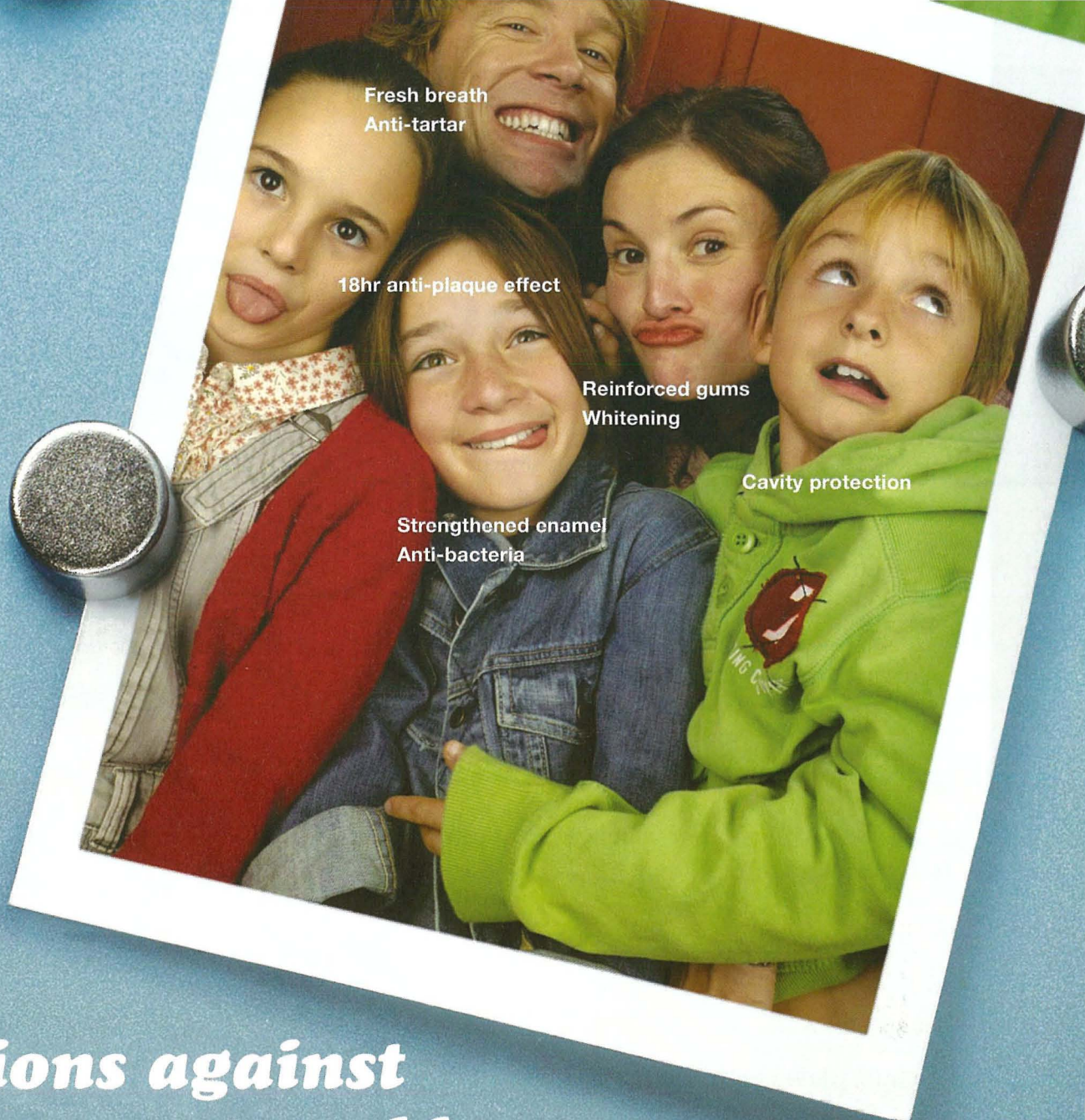
Tip 1 refines the access of the cavity walls by removing restorations, caries and dentine inferences from the access cavity walls.

Tip 2 helps locate the second mesiobuccal canal of maxillary molars by removing the dentinal layer in the pulp chamber floor.

Tip 3 removes calcifications from the pulp or from the root canal coronal third.

Tip 4 will remove screw or cast metal posts.

Tip 5 removes calcifications from the pulp chamber floor. 



Fresh breath
Anti-tartar

18hr anti-plaque effect

Reinforced gums
Whitening

Cavity protection

Strengthened enamel
Anti-bacteria

8 actions against the frequent problems identified by dentists.

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- ✓ Whitening
- ✓ Fresh breath
- ✓ Strengthened enamel

Signal **FAMILY PROTECTION**

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- ✓ Fresh breath
- ✓ Strengthened enamel
- ✓ Reinforced gums
- ✓ 18hr anti-plaque effect
- ✓ Anti-tartar
- ✓ Anti-bacteria



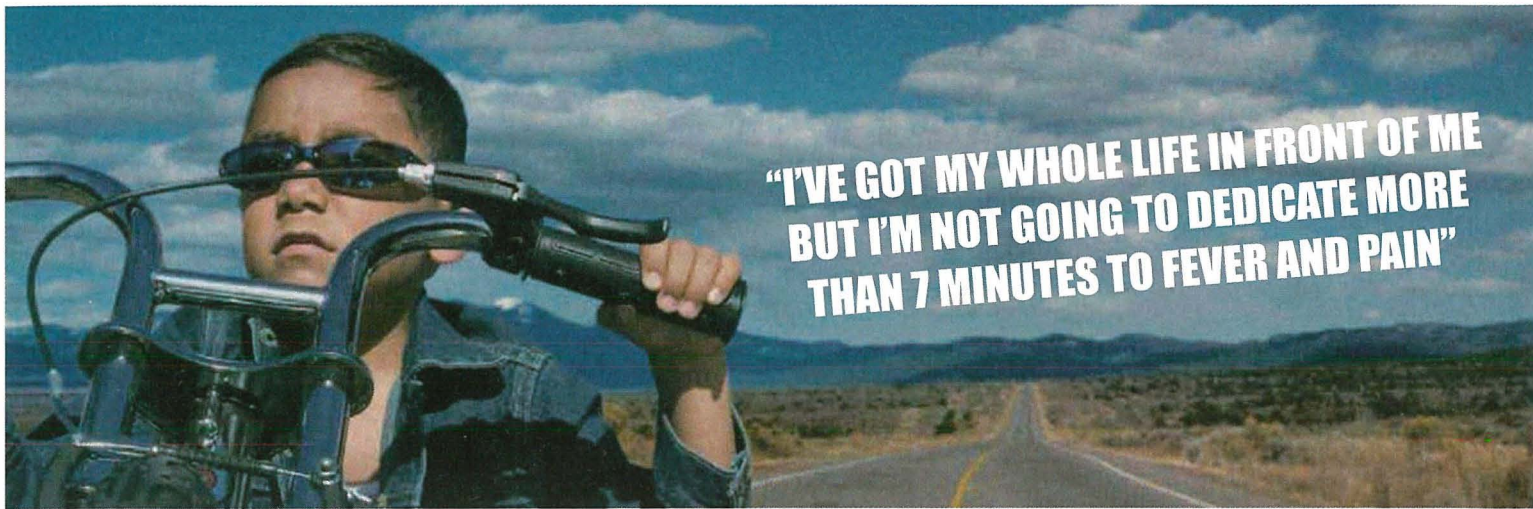
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BUT I'M NOT GOING TO DEDICATE MORE
THAN 7 MINUTES TO FEVER AND PAIN"**

ALGIDRIN

ADULTS AND PAEDIATRIC

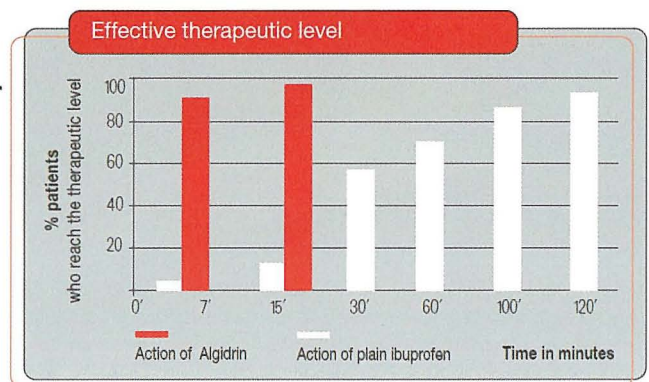
Ibuprofen Lysinate in single dose sachets

Less time to alleviate the pain

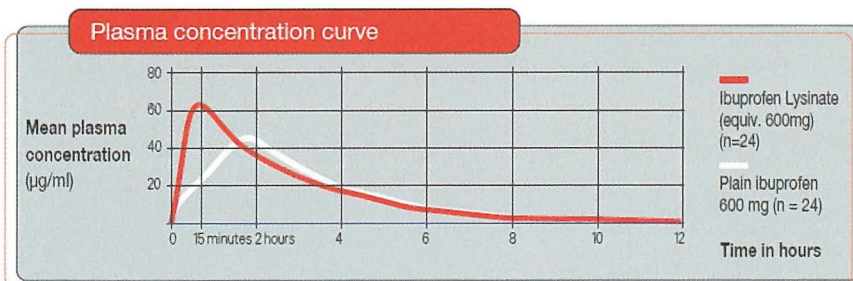
Algidrin ibuprofen lysinate reaches plasma levels faster than plain ibuprofen:

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Meanwhile, plain ibuprofen needs nearly 2 hours to achieve the same results.⁽¹⁾



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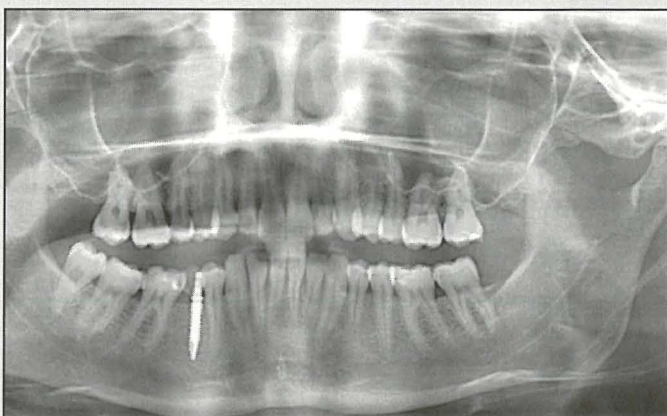
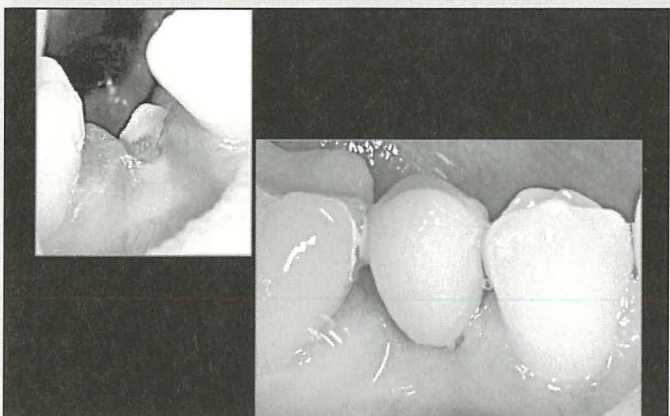
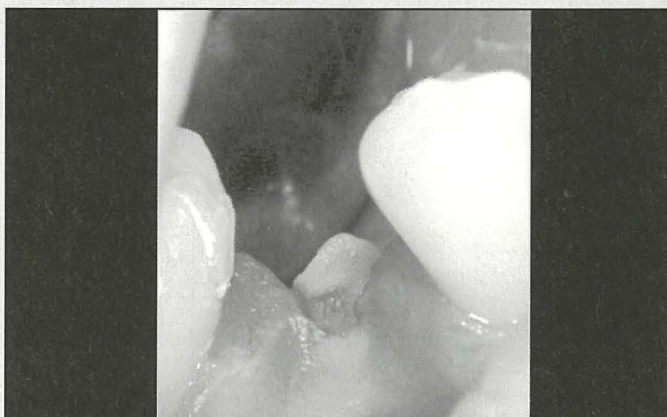
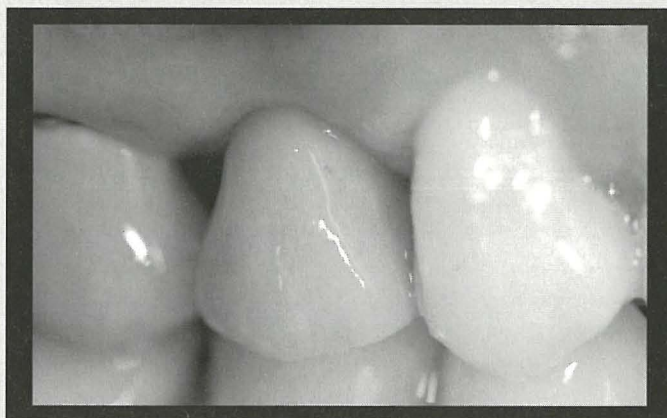
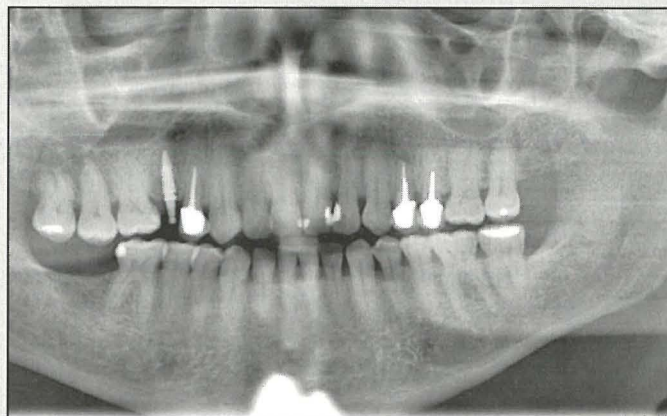
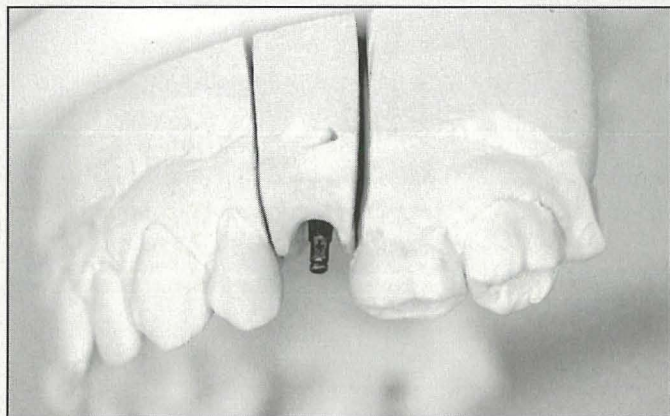
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FLAPLESS SURGERY AND ITS EFFECTS ON DENTAL IMPLANT OUTCOMES

Continues from page 29



Continues on page 36

ANTERIOR TOOTH TRAUMA

The Annual Dental Conference lecture By Dr Audrey Camilleri BChD, MSc (Lon) MFDS(RCS)(Edin) Paediatric Dentist.
Summarised by Dr David Muscat.

TRAUMA – take medical and dental history. Exclude child abuse. Do work immediately. Monitor. Long-term follow up.

DECIDUOUS TEETH

33% of 5 year olds have had some sort of tooth trauma. A crown fracture is common. Smoothen the sharp edges. Apply a glass-ionomer bandage or a composite. Use 3M anterior strip crowns.

Soft diet indicated. Parents are asked to check for changes in colour and/or swelling. Loss of vitality monitored so as to avoid damage to the permanent tooth. With deciduous teeth you need two negative vitality tests, not one.

If the crown fractures, extract. Regarding a root fracture, if there is minimal displacement, observe. If there is mobility, remove the coronal part of root but do not remove the apical portion. It will eventually push out.

Removing it could result in damage to the permanent tooth. Luxation, Concussion,

Subluxation=NO treatment required. Extrusion=displacement out of the socket=EXTRACT, or may try mild repositioning unless there is occlusal interference.

Lateral Luxation which direction has the tooth moved? If it is in the direction of the developing tooth germ=extract. Intrusion=wait and see. Will spontaneously erupt.

Avulsion=NEVER re-implant a deciduous incisor. There is no need for space maintenance. Laceration. With degloving, use resorbable sutures. Avoid LA as child will get upset.

ENDODONTICS ON A,B.

Use non-setting zinc-oxide eugenol. Expect delayed exfoliation. Sequelae to damage to deciduous incisors may be hypocalcification, whitening of the permanent incisors.

PERMANENT TEETH IN CHILDREN

Monitor vitality. With a fracture involving the pulp, use a direct pulp cap, a pulpotomy or a pulpectomy.

The Partial pulpotomy=much higher success rate. Remove 2mm of pulp. Place calcium hydroxide or MTA, and build up with composite. You want continued root development these are teeth with open apices.

FRONTAL IMPACT

If the cervical aspect is fractured, splint for 4 months. With luxation, concussion and subluxation there is no need to splint. With extrusion, the teeth will die. Root fill 2 weeks later.

LATERAL LUXATION


Reposition the tooth with forceps

INTRUSION

If mild expect spontaneous re-eruption.

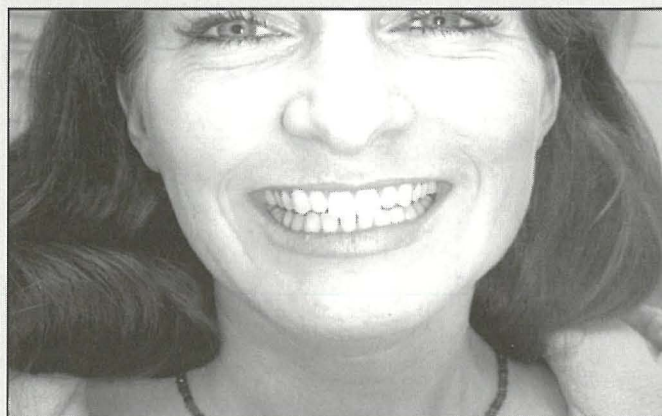
AVULSION

Reimplant. Tetanus jab. Splint placement. You will need ortho wire, wire cutters, ethyl chloride and flowable composite.

The MESH SPLINT is useful- this is placed on the buccal aspect of the traumatized teeth. Leave for 2-4 weeks. 

FLAPLESS SURGERY AND ITS EFFECTS ON DENTAL IMPLANT OUTCOMES

Continues from page 35



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Plaque is the main cause
of disorders of teeth and gums.

Mentadent offers a range of products
specifically designed to combat it and to
take care of you and your entire family.

Pen pictures of 19th century dentists in Malta

The American Connection

By George. E. Camilleri

The first entry in my records regarding an American dentist is of Dr. A.H. Chamberlain when in 1875 he advertised in the Malta Times.

The advertisement read "Dr. A.H. Chamberlain. American Dentist of Naples will be in Malta, on a professional visit, on or about 21st instant. Letters may be addressed to the Imperial Hotel, Valletta. Drs. Dempster and Chamberlain, American Dentists, Palazzo Scaletta, Riviera di Chiaja, Naples."

He resided at the Imperial Hotel in 63 St. Lucy Street, Valletta, at least from 2nd to 30th December 1876. He was in practice in Naples but seemed to be testing the possibility of expanding to Malta. There is no evidence that he established himself in Malta.

Towards the end of the century there was considerable official disquiet regarding the regulation of dental practice in Malta. The number of dentists with a Government warrant to practice was small and all were practicing in Valletta which made control of illegal practice impractical. The Government authorities were pressing the University to start a dental course and half-heartedly attempting to curb illegal practice. In 1900 the Council of Government was debating the new Second Sanitary Profession Ordinance which included regulatory articles on dental Practice.

During the proceedings the fact that there were not enough dentists and phlebotomists was raised leading Mr. Darmanin to suggest "Signor Presidente, gli Americani sono i migliori dentisti, forse potrebbe capitarne uno". This was probably said with tongue in cheek and was obviously not followed up.

In 1905 two British dentists with American qualifications petitioned for registration. By this time the Second Sanitary Law of 1901, which excluded dentists with a non-British degree from automatic registration, had been passed. Dr. C.H. Boyes, a graduate from Northwestern University Chicago wrote from Quetta, then in British



91, St Lucy Street, Valletta.
Site of former Imperial Hotel

India now in Pakistan for a warrant to practise dentistry in Malta.

The new law was quoted to him excluding automatic registration in his case. Dr. Frank Mellersh wrote, also in 1905, requesting information on the requirements to practice dentistry in Malta. He was a British subject, graduated in Dentistry from the Pennsylvania Dental School and was then working in Canada. This request led to some correspondence between the Lieutenant Governor and the Rector.

The University was then revising its statutes and the General Council decided that one or two articles in connection with the granting of this dental diploma should be introduced. The Special Council of Medicine unanimously agreed to the conditions and Syllabus on which the examination for the granting of the Diploma of Dentist-Surgeon was to be held, and that it should be identical with those required by the General Medical Council of Great Britain and by the Birmingham School of Dentistry from whom advice had been sought.

The Council also requested the Government to make sure that the UK Medical Council accepted University of Pennsylvania as a 'recognised University'. However no American Universities were recognised by the UK Medical Council so that he would have had to sit for a statutory exam. Unfortunately the University statutes regulating the examination for the new Diploma in Dental Surgery were only passed in 1907 so that. Frank Mellersh was effectively excluded in spite of Mr. Darmanin's hopes.

In 1908 Pascal Demajo went to work for some years in Philadelphia in the dental field. On his return to Malta, his application to sit for the Diploma in Dental Surgery was refused on the grounds that he could not produce evidence that he had been engaged for four years in professional studies. However his trail blazing trip bore fruit when his two sons later went to the United States and graduated in Dentistry from the Northwestern University, Chicago. 🇺🇸



RELIEVES
PAIN



REPAIRS

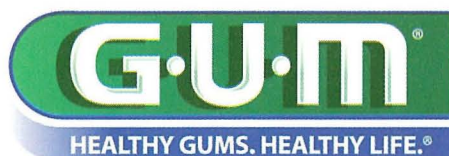


PREVENTS

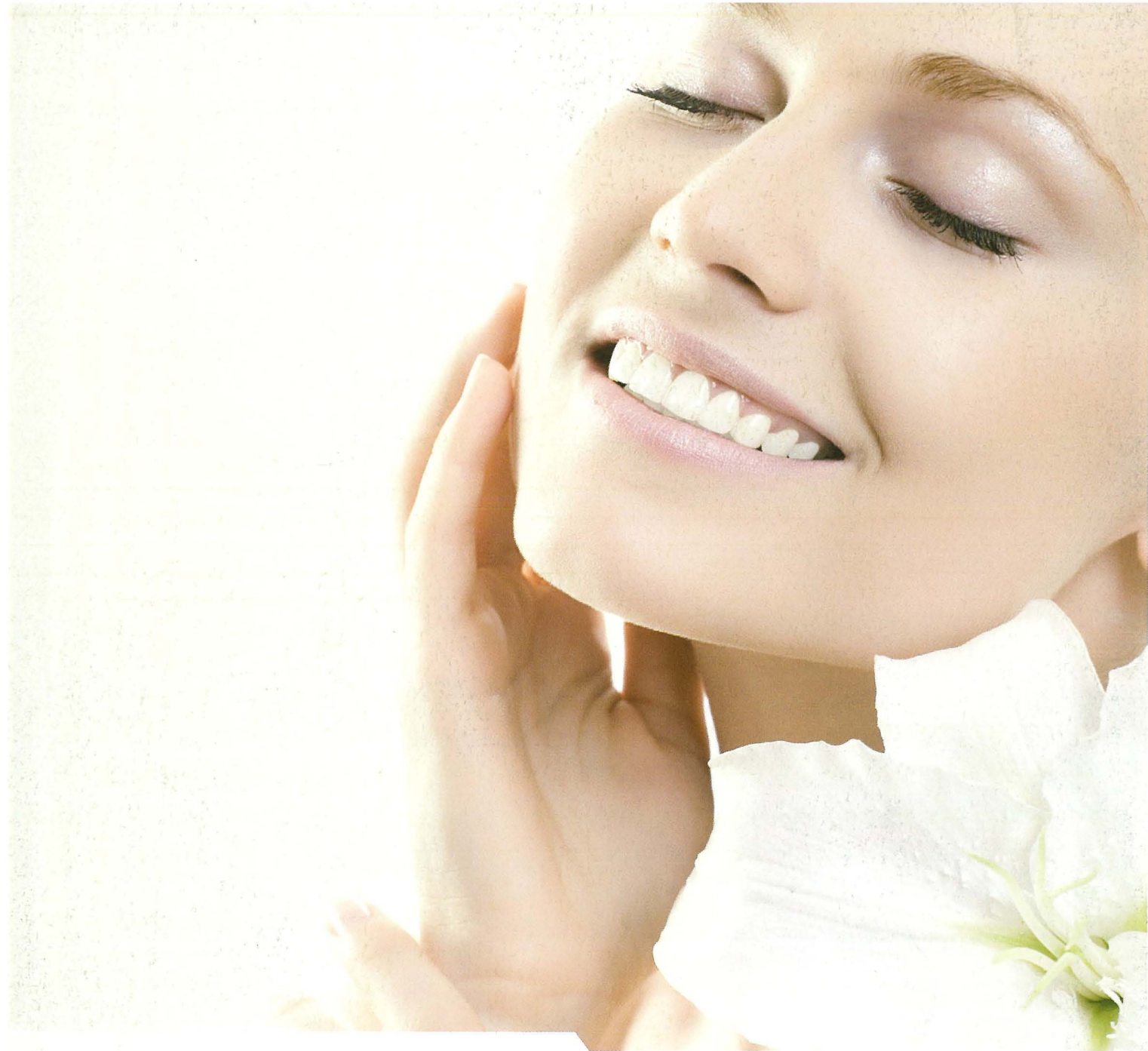
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