## Dental news

The BDJ News section accepts items that include general news, latest research and diary events that interest our readers. Press releases or articles may be edited, and should include a colour photograph if possible.

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#### IMPROVED CHILD PROTECTION TRAINING NEEDED

A paper in this issue of the *BDJ* has found that few dental professionals with child protection training have experience of making referrals, and reports a wide gap in practice between recognising signs of child abuse and neglect and responding effectively.

The two part paper, the first of which is entitled Safeguarding children in dentistry: 1. Child protection training, experience and practice of dental professionals with an interest in paediatric dentistry, (BDJ 2009; 206: 409-414) found that there was a need for improved child protection information, support and training for dental professionals. The authors found that lack of certainty about the diagnosis was perceived to be the biggest barrier to referral, with 32% of respondents reporting a lack of knowledge of referral procedures.

According to lead author Jenny Harris, a Specialist in Paediatric Dentistry with Sheffield Salaried Primary Dental Care Service, in contrast to previous similar studies with UK dentists, a high proportion of respondents had done child protection training and despite the fact

that 67% had suspected abuse or neglect of a child patient at some point in their career, far fewer had ever made a child protection referral.

'We now know a lot about the factors that get in the way of dentists taking action when they suspect that a child is being abused or neglected. It is essential that child protection training effectively tackles these barriers and equips us not only to recognise signs, but also to respond appropriately. Developing good local systems to give dental teams ready access to advice and support would also help considerably,' she said.

The study was initially carried out as part of a learning needs analysis for the Department of Health funded project, 'Child Protection and the Dental Team.' The project, carried out in association with the Committee of Postgraduate Dental Deans (COPDEND), had the remit to develop an educational resource on child protection specifically for dental teams. It resulted in publication of a handbook and website (www.cpdt.org.uk) in May 2006.

A report at a scientific conference of

the early findings of this study received the attention of the Paediatric Dentistry Policy and Clinical Effectiveness Committee. They responded by inviting development of a new British Society of Paediatric Dentistry policy document on child dental neglect. The finished consensus document is expected to be published online early this summer.

#### WHY WE HAVE A SINGLE ROW OF TEETH

A system of opposing genetic forces determines why mammals develop a single row of teeth, while sharks sport several, according to a study published in the journal *Science*. When completely understood, the genetic programme described in the study may help guide efforts to re-grow missing teeth and prevent cleft palate, one of the most common birth defects.

Researchers discovered that turning off a single gene in mice resulted in development of extra teeth, next to and inside of their first molars. While the study was in mice, past studies have shown that the involved biochemical players are active in humans as well.

'This finding is exciting because extra teeth developed from tissue that normally does not give rise to teeth,' said Rulang Jiang, PhD, Associate Professor of Biomedical Genetics at the University of Rochester Medical Center, USA and an author of the article (*Science* 2009; 323(5918): 1232-1234).

'It was amazing to find that deleting one gene caused the activation of a complete tooth developmental programme. Finding out how the extra teeth developed will reveal how nature makes a tooth from scratch, which will guide tooth regeneration research.'

#### DENTAL FILM NOMINATED FOR AWARD

A ten-minute film to help prepare dental hygiene and dental therapy students for the procedure of tooth extractions in young children has been shortlisted for a 'Learning on Screen' award.

The film, which was produced by the University of Portsmouth eLearning team in partnership with Hampshire Primary Care Trust, was made because students were often anxious before placements in paediatric day surgery.

It shows in detail the whole procedure of children being anaesthetised and having teeth extracted and features interviews with a dentist, an anaesthetist and nurses who talk about minimising the impact of surgery.

Richard Hackett, Head of Media Production at the University of Portsmouth and the film's director, said the video provided a way of visually introducing to students the work of a dental care unit, the paediatric patient, the range of skills they will gain there and the staff who will support their learning.

At Queen Alexandra Hospital's

Poswillo Dental Care Unit, which features in the film, 846 out of 992 patients having teeth extracted in 2008 were children. The aim of the film, 'Dental anaesthetics in Portsmouth: a preventable experience', is to prepare students for their placements, but the underly-

ing message explains how surgery can be prevented if children and parents are better educated about dental care.

The Learning on Screen Awards, organised by the British Universities Film and Video Council (BUFVC), celebrate and reward excellence in the use of moving image, sound and related media in learning, teaching and research.



The picture shows Justin Vaughan, Bill Stote, Matt Saxey and the director, Richard Hackett

#### **ALUMNI TO GATHER**

The last Eastman Prosthodontic Alumnus to be held with Derrick Setchell as Head of Department will take place on 25-26 June 2009, ahead of his retirement. Derrick is credited with enhancing the international reputation of the department (formerly Conservative

Dentistry) with his inimitable style of teaching and research over the last 33 years.

A scientific programme will be held over the two days, culminating in a conference dinner. For further details contact c.tredwin@eastman.ucl.ac.uk, or Maria Goodin on 0207 915 1027.

#### STUDENT FITNESS TO PRACTISE

The GDC is gathering views on the draft guidance regarding student fitness to practise through a new consultation. The guidance document is aimed at student dentists and all student dental care professionals, as well as the institutions which provide dental training.

The purpose of the guidance is to instill in students a greater awareness of professionalism and a commitment to the GDC's *Standards for dental professionals*. Another key aim is to help dental schools and other training providers deal with issues which may arise during a course of study that call into question

whether a student is fit to practise during training or in the future.

The GDC has developed this guidance in response to the UK Government's White Paper *Trust, assurance and safety.* It requires the healthcare regulators to strengthen their relationships with healthcare students and the institutions which provide their training.

The aim of the consultation is to gather a range of views which will help make the guidance as effective and as helpful as possible. The consultation can be completed online at www.gdc-uk.org and will close on 26 May 2009.

#### **PAY RISE ACCEPTED**

Doctors and dentists in the UK are to receive a 1.5% pay rise this year. Ministers say they will accept the figures recommended by the Doctors' and Dentists' Remuneration Review Body. However, according to the British Dental Association, the increase will amount to only a 0.21% gross pay uplift and does nothing to provide a much needed boost for NHS dentistry. John Milne, Chair of the BDA's General Dental Practice Committee, said, 'Sadly, the basis of the formula which suggests that the increase might amount to 1.5% in real terms does not take account of the effect of the devaluation of sterling and its effect on the prices of equipment and materials that are largely manufactured overseas. These expenses, and dentists' ability to access the finance necessary to met them, are both adversely affected by the recession.'

#### PAPER LOOKS AT THE FIRST EVER DENTIST

Examining surviving skeletal and mummified remains from ancient Egypt can provide evidence for the dental health of the ancient Egyptian civilisation, according to a paper in this issue of the BDJ. The first of a two part paper, Dental health and disease in ancient Egypt (BDJ 2009; 206: 421-424) suggests that the same dental diseases have been present with man over the millennia, but the incidence of these diseases varies considerably with changing environmental factors.

The second paper, *The practice of dentistry in ancient Egypt*, provides an insight into the origins of the dental profession and the world's first recorded dentist, Hesyre. The paper, which will be published in the next issue of the Journal, also looks at dental remedies and treatments of the ancient Egyptian civilisation that suggest that the sources of some modern therapies lie in the distant past.

Author Dr Roger Forshaw, Honorary Research Associate at the KNH Centre for Biomedical Egyptology, University of Manchester, said, 'I embarked on this study trying to analyse the subject from both a dental and an archaeological perspective. My forthcoming papers on dental health, disease and dentistry in ancient Egypt are the results of my studies into the various sources of information on this topic and in addition present a review of previous investigations by both Egyptologists and dental surgeons. This information is also supported by my own research into the skeletal remains from this ancient civilisation.'

He added that one of the aims of the articles is to attempt to present an insight into the origins of the dental profession and to provide details of the world's first recorded dentist, who lived in ancient Egypt some 4,600 years ago. Dr Forshaw's future research in this area will explore the effectiveness of the various ancient pharmaceutical treatments for the relief of dental conditions.

An exquisitely carved wooden panel depicting Hesyre, believed to be the earliest recorded dentist in Egypt and in the world. Six carved wooden panels were found in his tomb at Saqqara near modern day Cairo



#### NEW ZEALAND'S CHIEF DENTAL OFFICER VISITS CARDIFF

An innovative community project offering Cardiff University dental students the chance to manage and treat real patients has been praised by New Zealand's Chief Dental Officer, Dr Robin Whyman.

During a UK visit, Dr Whyman visited Cardiff's St David's Primary Dental Care Unit. One of the key features of the Dental Care Unit is the opportunity for fifth-year dental students to

From left to right: New Zealand's Chief Dental Officer Dr Robin Whyman, School of Dentistry student Rob Woodward, Director of St David's Primary Dental Care Unit, Mr Peter Ash and Dental Nurse Victoria Haywood

take responsibility for patients. Each student treats on average six patients per day and works, under supervision, towards their individual diagnosis and treatment.

The Dental Care Unit's surgeries are equipped with the latest dental technology including digital radiography and intra-oral cameras. The latter technology enables patients to see inside their own mouths, helping them to understand the reasons for their treatment.

In addition, operating microscopes aid the management of more complex cases and the four surgeries are all equipped for treatment under inhalation sedation.

Dr Whyman said, 'This is an excellent example of how the community's need for dental treatment can be met by dental students. Not only do patients get the treatment they need but, at the same time, students gain the vital hands-on knowledge and experience that can only be gained by working with real patients in the community'.

# **DIARY**

#### **MAY**

#### **ADI Biennial Implant Team Congress**

Date: 7-9 May 2009 Venue: ICC, Birmingham www.adi.org.uk

#### British Society for Restorative Dentistry Spring Scientific Meeting – Clinical Choices

Date: 8-9 May 2009 Venue: Royal College of Surgeons

of Edinburgh www.bsrd.org.uk

#### Materials in Dentistry

Date: 8 May 2009 Venue: Institute of Materials, Minerals and Mining, London Email: dawn.bonfield@iom3.org www.iom3.org/events/dentistry

### Clinical Innovations Conference and Annenberg Lecture

Date: 15-16 May 2009

Venue: Royal College of Physicians, London

Tel: 020 7400 8989 Email: info@smile-on.com www.smile-on.com

#### JUNE

### British Dental Association Conference and Exhibition 2009

Date: 4-6 June 2009 Venue: Scottish Exhibition and Conference Centre, Glasgow www.bda.org/events

#### World Aesthetic Congress (WAC)

Date: 12-13 June 2009 Venue: Queen Elizabeth II Conference Centre, London www.independentseminars.com

#### **JULY**

## FGDP(UK) Implementation of the Dentists with Special Interests Scheme

Date: 3 July 2009 Venue: BMA House, London Tel: 020 7869 6772

Email: fgdp-education@rcseng.ac.uk

#### FDI Rio Caries Conference

Date: 15-17 July 2009 Venue: Rio Centro Exhibition and Convention Centre, Brazil www.fdiworldental.org

#### WHITE WINE CAN STAIN TEETH

A recent study by New York University dental researchers has found that drinking white wine can increase the potential for teeth to take on dark stains. The researchers compared two sets of six cow teeth, whose surface closely resembles that of human teeth, and used a spectrophotometer, an instrument that measures colour intensities, to evaluate staining levels.

They found that teeth soaked for one hour in white wine before being immersed in black tea had significantly darker stains than teeth immersed for one hour in water before exposure to the tea.

'Dipping teeth in white wine for one hour is similar to the effect of sipping the wine with dinner. The acids in wine create rough spots and grooves that enable chemicals in other beverages that cause staining, such as coffee and tea, to penetrate deeper into the tooth,' said Dr Mark Wolff, Professor and Chairman of the Department of Cariology & Comprehensive Care at New York University College of Dentistry. Professor Wolff oversaw the study, which was led by Ms Cristina M Dobrescu, a third-year student.

However, when the researchers repeated the experiment with red wine, the resulting stains were significantly darker than those in the white wine group, as red wine contains a highly-pigmented substance known as chromogen. The findings were presented at the annual meeting of the International Association for Dental Research in Miami, Florida.

#### **GREEN TEA FOR HEALTHY GUMS**

Routinely drinking green tea may help promote healthy teeth and gums, a Japanese study has found. The study surveyed the periodontal health of 940 men, aged between 49 and 59. The presence of all three indicators of periodontal disease – periodontal pocket depth, clinical attachment loss of the gum tissue and bleeding on probing of the gum tissue – was found to be indirectly proportional to the green tea

consumption of the subject. Subjects who regularly drank green tea had lower instances of periodontal disease.

The positive effects of green tea on periodontal health may be down to the antioxidant catechin, which reduces inflammation in the body. The study, recently published in the *Journal of Periodontology*, was headed up by Dr Yoshihiro Shimazaki of Kyushu University (*J Periodontol* 2009; 80: 372-377).

#### **NEW USE FOR GAMES CONSOLE**

Three final year dental students at the University of Glasgow Dental School have developed the concept of using Nintendo Wii technology to help dental students try out their operative skills.

The students are winners of The Dental Innovation Technology Ideas Award, which challenges final year students to develop an idea for a new piece of technology or innovation in the dental field.

The winning idea would utilise the Nintendo Wii console using special software to simulate operative techniques. The wireless controllers would be used by dental students to control the handling of instruments on a virtual patient on the screen. The controller could also

be used to provide sensory feedback to the user.

Dr David Watson of the University of Glasgow Dental School commented, 'The use of Wii technology could be a really innovative and cost-effective solution which students could use to improve their manual dexterity. There is considerable research to back up the concept of using video games to improve dentists' coordination and the Wii-based application would complement the simulation technology already used in dental schools worldwide.'

The students – Pearse Hannigan, David Lagan and Adam Gray – were presented with a cheque for £300 and a glass obelisk.