

Other journals in brief

A selection of abstracts of clinically relevant papers from other journals.

The abstracts on this page have been chosen and edited by John R. Radford.

ENDODONTIC MICROSURGERY: COST-EFFICACY

Cost-effectiveness of endodontic molar retreatment compared with fixed partial dentures and single-tooth implant alternatives

Kim SG, Solomon C. *J Endod* 2011; **37**: 321–325

Estimated costs to treat teeth with failed endodontics differ.

Based on ADA fees (for example, \$4,569.95 for a single implant), this study compared the costs to treat a first molar tooth with failed endodontics using different approaches. Endodontic microsurgery was more cost-effective than nonsurgical retreatment that in turn was more cost-effective than extraction and bridge replacement. Extraction and a single implant-supported restoration was the least cost-effective. These findings contrast with those reported by Pennington MW, Vernazza CR *et al.* (*Int Endodont J* 2009; **42**: 874–883) when treating a central incisor tooth with failed endodontics. Possible explanations for this are that in this study by Kim and Solomon, the 'success rate' for endodontic microsurgery was 94% compared with a 'failure rate' of 32% after apical surgery in the latter study, and the studies used different fee scales.

DOI: 10.1038/sj.bdj.2011.1025

ANKYLOSIS

Spontaneous re-eruption of a permanent maxillary central incisor after 15 years of ankylosis – a case report

Schott TC, Engel E *et al.* *Dent Traumatol* 2011; doi: 10.1111/j.1600-9657.2011.01041.x

The merit or otherwise of watchful waiting.

Teeth that are intruded as a consequence of injury can develop one of several perturbations including ankylosis-related (replacement) resorption. A Cochrane Review (*Interventions for the management of external root resorption*) concluded there is no evidence as to how this condition should be managed. The authors of this paper state that if the injury results in only mild intrusion, the tooth could spontaneously re-erupt, particularly if root growth is incomplete. But how long should the practitioner monitor the situation? This case history describes the care of a patient who, when seven years old, received a traumatic intrusion of UL1. The tooth became ankylosed. Ten years later, the dental aesthetic of the submerged tooth was restored with a metal ceramic crown. Some 15 years after the injury, the tooth spontaneously re-erupted. A combined orthodontic/restorative approach restored a satisfactory dental appearance.

DOI: 10.1038/sj.bdj.2011.1026

OBESITY-YEARS: 'PACK-YEARS'

Commentary: Obesity-years—a new metric to measure health effects of obesity

de Koning L, Hu FB. *Int J Epidemiol* 2011; **40**: 996–997

Obesity-years, akin to 'pack-years' when quantifying cigarette smoking, may be the most useful measure for studying deleterious effects.

Although obesity is associated with type 2 diabetes, cardiovascular disease and tumours, 'the absolute risk per year is quite small'. This commentary summarises and reflects on the substantive paper published in this edition of the journal (Asnawi A, Wolfe R *et al.* *Int J Epidemiol* 2011; **40**: 985–996). In this study, BMI was measured every 2 years. The investigators found that when controlling for numerous confounders, those who were obese (BMI ≥ 30 kg/m²) over the whole period of >25 years, were 2.5 times more likely to die compared with those who had never been obese. Not only then is the measure of obesity-years analogous to 'pack-years' for quantifying cigarette smoking, but there is a further link in that obesity 'may undo longevity gains in Western countries that were made by reducing smoking rates.'

DOI: 10.1038/sj.bdj.2011.1027

SMOKING

Causal assessment of smoking and tooth loss: a systematic review of observational studies

Hanioka T, Ojima M *et al.* *BMC Public Health* 2011; **11**: 221

'Early death in current smokers that have lost more teeth than non-smokers could dilute the effect of smoking in the elderly...'

Randomised controlled design studies examining the effects of smoking on health are unethical. This systematic review examining dental health included six authoritative (using the modified Newcastle–Ottawa Scale for assessing the quality of nonrandomised studies) cross-sectional studies and two cohort studies. The key findings were 1) the strength of association between smoking and tooth loss was only moderate, 2) there was a dose response, and 3) future tooth loss was reduced in those who quit smoking. The investigators make the germane point that the association between smoking and tooth loss would be stronger if those who had smoked did not sadly die prematurely. Nevertheless, putative mechanisms as to how smoking could cause periodontal disease underpin this link and these are summarised clearly in this paper.

DOI: 10.1038/sj.bdj.2011.1028