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 Dr Trevor Watts.

PROSTHODONTICS

Oral manifestations of diabetes mellitus in complete denture wearers

de Lima DC, Nakata GC *et al.* *J Prosthet Dent* 2008; **99**: 60–65

No differences were found in most oral parameters studied.

Various problems have been reported to affect complete dentures (CDs) in diabetics. In particular, a lower salivary flow rate and mucosal lesions may affect denture use. In a Brazilian university clinic, 30 subjects with type 2 diabetes and CDs were compared with 30 non-diabetic subjects also with CDs.

Between-group differences were found in mean blood glucose level (diabetics: 182 mg/dl *v.* controls: 111) and salivary buffering capacity (diabetics lower). Both groups had similar levels of salivary flow, self-reported denture retention, medication use, mucosal lesions and smoking.

DOI: 10.1038/sj.bdj.2008.352

PREVENTIVE DENTISTRY

Comparing the caries-preventive effect of two fissure sealing modalities in public health care: a single application of glass ionomer and a routine resin-based sealant programme. A randomized split-mouth clinical trial

Kervanto-Seppälä S, Lavonius E *et al.* *Int J Paediatr Dent* 2008; **18**: 56–61

Resin-based sealant (RBS) with resealing was more effective than a single glass ionomer cement sealant (GICS) application.

While smooth surface caries has reduced in industrialised societies, pit and fissure caries in proportion has tended to increase. In this Finnish study of 599 children aged 12–16 yrs, a split mouth random comparison was made of sealing with GICS and RBS in erupted 2nd molars considered at risk of caries. RBS judged deficient at a subsequent examination was resealed, but not GICS.

At 3 yrs, out of a total of 657 pairs of teeth, 27 sealed with GICS had dentine caries, and 7 sealed with RBS. RBS was 74% effective in caries prevention, and in comparison GICS was 4 times as likely to have dentine caries. GICS was 19 times more likely than RBS to be lost. The authors recommend use of RBS for preventing dentine caries, and consider it cost-effective if limited to children and teeth at high caries risk.

DOI: 10.1038/sj.bdj.2008.353

ENDODONTICS

A six-year evaluation of cracked teeth diagnosed with reversible pulpitis: treatment and prognosis

Krell KV, Rivera EM *J Endod* 2007; **33**: 1405–1407

About 1 tooth in 5 needed root canal treatment (RCT) within 6 months.

Reliable data on the clinical outcome of treatment of cracked teeth are limited. In a US endodontic practice over a 6 yr period, 796 of 8175 teeth were diagnosed with cracks, on the basis of a definite shadow with transillumination. Reversible pulpitis (RP) was identified in 127 of these (no spontaneous pain history, cold response lasted <5 sec, no radiographic pathosis).

Crowns were provided for all teeth with RP. In teeth with cracks and RP, 21 developed irreversible pulpitis within 2 months, and 6, a necrotic pulp within 5 months. None of the other 100 required RCT. There were increases of up to 2 mm in proximal PD adjacent to 5 cracks.

DOI: 10.1038/sj.bdj.2008.354

SURGERY

The prospective experience of a maxillofacial surgeon with the percutaneous endoscopic gastrostomy technique

Avery C, Shenoy S *et al.* *Int J Oral Maxillofac Surg* 2008; **37**: 140–148

Percutaneous endoscopic gastrostomy (PEG) may be safely performed by a maxillofacial surgeon trained to use it.

Patients with head and neck malignancy are often fed via PEG when nutritional support is required for more than 2–4 weeks. PEG is often performed by a gastroenterologist or a gastrointestinal or general surgeon. Over a 7 year period, PEG insertion was attempted 225 consecutive times on 206 patients (mostly because of malignancy) by a maxillofacial surgeon.

Median PEG time was 10 min, and insertion was 97% successful. Major complications occurred on 7 occasions and minor complications on 26. Mortality at 30 days was 6%, but was not from PEG. Median duration of the PEG was 337 days, and was significantly less after surgery alone. The authors consider the complication rates similar to those reported in gastroenterological literature.

DOI: 10.1038/sj.bdj.2008.355