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of algorithms that are specifically designed for SC detection. Some of these are now accessible through mobile applications, making them available to health care providers. By simply capturing pictures of suspicious skin lesions using a smartphone, these apps can classify them as either highor low-risk for skin cancer.<sup>2</sup> Considering the importance of early detection in the fight against SC, the integration of an AI-based smartphone application could be highly beneficial.

With the involvement of an AI-driven app in their regular check-ups, dentists can promptly detect suspicious skin lesions, leading to earlier referrals and improved patient outcomes. This approach not only improves patient experience but also alleviates the workload of manual skin examinations, allowing dentists to dedicate more attention to their primary responsibilities while simultaneously providing additional healthcare support to patients through AI technology.

E. Veseli, Pristina, Kosovo

#### References

- Drodge D R, Staines K, Shipley D. Skin cancer what general dental practitioners should look for. Br Dent J 2024; 236: 279–283.
- Smak Gregoor A M, Sangers T E, Eekhof J A et al. Artificial intelligence in mobile health for skin cancer diagnostics at home (AIM HIGH): a pilot feasibility study. EClinicalMedicine 2023; doi: 10.1016/j. eclinm.2023.102019.

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## Orthodontics

### Biodegradable clear aligners

Sir, I read with great interest the letter on recyclable clear aligners published on 11 March 2024.1 While recycling clear aligners seems to be the need of the hour due to the adverse impact on the environment, there are alternatives to recycling, such as using biodegradable aligner sheets. While looking for BPA-free aligner materials and recyclable options, we came across some compostable and completely biodegradable materials. Interestingly, these materials are claimed to be more flexible and stronger than their commercially available counterparts and offer the same clarity levels.2 However, these must be researched to determine whether they are viable alternatives to the currently available plastic aligners.

The major brands have increased their efforts in recycling, but there is such a huge

plastic burden on our environment that a lot needs to be done to make a definite change.<sup>3</sup> We need to reduce the use of PVS impressions and plastic trays and move to direct printed aligners.<sup>4</sup> Many more such areas need to be focused on to help reduce waste from used and unused clear aligners in our environment.

A. Marya, Phnom Penh, Cambodia; H. Viet, Ho Chi Minh City, Vietnam

## References

- 1. Veseli E, Veseli K, Behluli E. Recyclable aligners. *Br Dent* J 2024; **236:** 360.
- Good Fit. GT FLEX GREEN the World's First 100% Compostable, Plant-Based Material for Clear Aligners & Retainers. Available at: https://goodfit.com/clearaligners-and-retainers/gt-flex-green-compostableplant-based-aligner-retainer-material/ (accessed April 2024).
- Stacey S. Aligner sustainability: No clear fit: Align Technology responds. *BDJ In Pract* 2023; 36: 6.
- Marya A, Venugopal A, Vaid N, Alam M K, Karobari M I. Essential attributes of clear aligner therapy in terms of appliance configuration, hygiene, and pain levels during the pandemic: a brief review. *Pain Res Manag* 2020; doi: 10.1155/2020/6677929.

https://doi.org/10.1038/s41415-024-7361-4

## **Global dentistry**

## Promoting informed choices: navigating global dental care challenges

Sir, we acknowledge the recent article that discussed a patient's challenging experience with a dental implant received during a visit to India, as documented by S. Mumtaz *et al.*<sup>1</sup> Our sympathies are with the patient who underwent a difficult ordeal and required additional treatment upon returning to the UK. The NHS faces significant challenges, exacerbated by post-pandemic economic factors like inflation and increased costs. Consequently, some individuals may consider seeking dental treatment elsewhere. We understand the tough decisions patients must make regarding their dental care in light of these circumstances.

While sympathising with the challenges faced by the patient, it is crucial to recognise that the outcome described may be attributed to the choice of a less-experienced practitioner rather than the geographical location of the treatment. It is unfortunate that the patient faced complications, but it's important to acknowledge the presence of well-qualified dental specialists in India who undergo rigorous training and adhere to international standards. Blaming solely the choice of destination may inadvertently perpetuate a stereotype that all overseas dental practitioners lack the necessary expertise. Moreover, globalisation has facilitated the exchange of knowledge, and many dental professionals worldwide have received extensive training and education in advanced dental procedures, including implantology. Patients opting for dental tourism should prioritise thorough research and select practitioners with recognised qualifications and positive reviews.

While the letter aptly emphasises the need for improved oversight in dental tourism, it is equally important to foster a collaborative approach that acknowledges the global competence of dental professionals. The emphasis should be on raising awareness about the importance of selecting experienced and qualified practitioners, regardless of the geographical location. Therefore, let us approach this issue with nuance, recognising that the incident described may be attributed to the choice of a less-experienced practitioner rather than implicating the capabilities of the entire dental community in a particular region. N. A. Sudharson, P. Lister, N. Gupta, Ludhiana,

N. A. Sudnarson, P. Lister, N. Gupta, Ludniana, India; M. Sharma, West Bengal, India

## References

 Mumtaz S, Singh Dubb S, Camilleri A. Backstreet implantology. Br Dent J 2024; 236: 229.

https://doi.org/10.1038/s41415-024-7362-3

## Oral health

#### Oral health and diabetes updates

Sir, in a recent review of the literature on the reciprocal relationship between oral health and diabetes, Harcke *et al.* found a two-way link between type 2 diabetes and poor oral health.<sup>1</sup> Rodríguez-Fonseca *et al.* revealed a higher rate of prediabetes in patients with oral lichen planus (OLP) compared to controls.<sup>2</sup> Their study of 275 patients, showed prediabetes as more common in OLP patients, especially those over 60 years old and those with more than three affected sites. They suggest that regular glucose testing could help manage potential complications.

Gibson *et al.* investigated over 213,000 participants and found that poor oral health, such as having fewer teeth and poor gum health, was associated with an increased risk of developing diabetes.<sup>3</sup> Their study suggested the potential value of oral health screening in diabetes prevention. Hessain

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*et al.* addressed that people with type 2 diabetes are more likely to rate their oral health as poor.<sup>4</sup> This association is stronger among those with lower education levels. Their study suggested that socioeconomic factors may influence the relationship between diabetes and oral health.

Tabesh *et al.* studied 200 type 2 diabetes patients, finding a significant correlation between oral health-related quality of life (OHRQoL) and the severity of xerostomia.<sup>5</sup> Factors such as age, denture wearing, disease duration, and diabetes management were also significantly associated with OHRQoL. The findings suggested that treating both diabetes and oral health issues like xerostomia is crucial for improving OHRQoL in these patients.

These studies continue to suggest a strong link between oral health and diabetes.

Y. Takefuji, Tokyo, Japan

#### References

- Harcke K, Lindunger A, Kollinus E et al. Observational study of selective screening for prediabetes and diabetes in a real-world setting: an interprofessional collaboration method between public dental services and primary health care in Sweden. Scand J Prim Health Care 2024; 42: 170–177.
- Rodríguez-Fonseca L, Llorente-Pendás S, García-Pola M. Risk of prediabetes and diabetes in oral lichen planus: A case-control study according to current diagnostic criteria. *Diagnostics (Basel)* 2023; doi: 10.3390/ diagnostics13091586.
- Gibson A A, Cox E, Gale J *et al.* Oral health status and risk of incident diabetes: A prospective cohort study of 213,389 individuals aged 45 and over. *Diabetes Res Clin Pract* 2023; doi: 10.1016/j.diabres.2023.110821.
- Hessain D, Dalsgaard E-M, Norman K, Sandbaek A, Anderson A. Oral health and type 2 diabetes in a socioeconomic perspective. *Prim Care Diabetes* 2023; 17: 466–472.
- Tabesh A, Mahmood M, Sirous S. Oral health-related quality of life and xerostomia in type 2 diabetic patients. *Dent Med Probl* 2023; 60: 227–231. https://doi.org/10.1038/s41415-024-7363-2

## **Oral health education**

### **Education of dental patients**

Sir, it is disappointing that there is little or no information regarding education of dental patients.

On establishing a new dental practice in 1988, it contained three rooms. My dental surgery, a dental hygiene surgery, and a preventive dental unit. Initially, all the patients were seen in my surgery, but with time I employed a dental hygienist.

My initial dental nurse was interested in adding to her qualification. She was encouraged to learn about dental education. On qualifying, she ran the PDU.

My schedule was organised such that extra time was allowed for procedures. This enabled me to, for example, give a patient an injection for a procedure in my surgery, leave them with my dental nurse, while I visited either the PDU or the hygienist surgery.

The PDU gave the opportunity to examine the child's teeth and mouth without them sitting in the dental chair. It also gave me the opportunity to emphasise the importance of proper toothbrushing. The dental health education ensured the parent knew how to supervise the child's toothbrushing at home.

In the hygienist surgery, I was given a verbal report of the condition of the patient's oral health. Extra time ensured the hygienist could check and educate the patient in dental health. After my examination, I could emphasise the importance of achieving and maintaining good oral health.

With time it was apparent that the patients spent more time in the hygiene surgery or PDU than they did in my surgery. With limited resources, I had to look to convert the patients to private practice. With the patients needing little treatment, schemes like Denplan and Practice Plan were very attractive.

I took on the lease of an adjoining unit. This enabled me to add two more dental surgeries and a hygienist surgery that were solely for NHS patients.

By encouraging the education of patients, the staff were motivated to obtain further qualifications. Two of my staff went on to become dental hygienists. We even took on the role of training student dental nurses for their qualification. I trained newly qualified dentists, helping them adjust to working in a dental practice. Everyone was educated in the power of prevention.

When I had to step away from dentistry I know that the new owners did not include patient education in their plans.

I know that politicians want to ensure children are taught toothbrushing in schools. It should be the parents who are responsible for ensuring their children clean their teeth properly. They need the education.

If the focus changed from treatment of patients to their education, all dentistry would be more successful. I know that the children that attended my practice will have grown up knowing how to look after their teeth and mouth. They even have the skills to ensure their own children will know how to look after their own dental health.

I hope this will stimulate a conversation on why there isn't more emphasis put on the education of patients.

> *T. C. Dickerson, England, UK* https://doi.org/10.1038/s41415-024-7360-5



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