

Oral health and sugarfree gum: myth busting



There are many assumptions and misconceptions associated with the state of oral health in Australia as well as chewing sugarfree gum. Here we tackle some of the most common ones.

“Australia’s oral health is not a pressing issue.”

While modern healthcare and dentistry techniques have significantly improved with new research and industry innovation, this doesn't mean that Australia's oral health is as good as it should be for a developed country, or is even necessarily improving year on year. In fact, while the number of Australian children with evidence of tooth decay fell between the 1970s and the 1990s, this has been on the rise again recently.¹

The poor state of oral health in Australia puts a significant strain on the public health system, which further complicates the issue of access to care for those who are in greatest need. With the average time on a public dental waiting list sitting at 27 months, 40% of Australians cannot access dental care when they require it.² Patients tend to visit the dentist to seek treatment when oral health symptoms become severe, rather than as part of a preventative or proactive approach to their oral health. Because of this, the issue of inadequate access to care is significant and can compound the severity and longevity of symptoms of oral disease and lead to poor quality treatment results, despite a significant public health investment in dental care.

“Oral health is mostly a cosmetic concern.”

It's certainly true that poor oral health can have a cosmetic impact on a person's appearance, which in turn can have an impact on their self-esteem and quality of life, however the problem runs much deeper than this. Poor oral health is an indicator of poor general health and is linked with nutrition deficiencies, poor diet, cardiovascular disease, stroke and adverse pregnancy outcomes.³ For example, a study of 2,000 patients with severe periodontal disease found that they were at a 17% increased risk for stroke compared to individuals with healthy gums.³

“Brushing and flossing is enough to maintain good oral health.”

Brushing and flossing are key parts of any healthy oral hygiene routine, however they form only two out of five steps recommended to maintain a healthy mouth and prevent cavities, also known as dental caries. In addition to brushing and flossing, regular dental check-ups, maintaining a healthy balanced diet and chewing sugarfree gum after eating and drinking, are all key to helping protect teeth from decay.

You can maintain a healthy oral care routine by following these five easy steps:

1

CHECK-UP



2

BRUSH



3

FLOSS



4

CHEW



5

HEALTHY DIET



¹Calache, H, Hopcraft, M and Martin, JM. 'Minimum intervention dentistry – a new horizon in public oral health care', 2013. Accessed: <http://onlinelibrary.wiley.com/doi/10.1111/adj.12046/full#adj12046-bib-0018>

²Australian Council of Social Services (2006), Fair dental care for low income earners: national report on the state of dental care, at: http://www.aocss.org.au/upload/publications/papers/1562__Fair%20dental%20care_%20final.pdf

³Dental Health Services Victoria. 'Links between oral health and general health – the case for action', 2011. Accessed: https://www.dhsv.org.au/_data/assets/pdf_file/0013/2515/links-between-oral-health-and-general-health-the-case-for-action.pdf



“The benefits of chewing gum are just marketing hype.”

The benefits of chewing sugarfree gum are supported by more than 35 years of peer-reviewed research by scientists and academics from around the world. This clinical research has clearly established the relationship between the use of sugarfree chewing gum and oral care benefits.

More than 25 national dental associations from around the world, including Australian Dental Association and the New Zealand Dental Association, have recognised the strength of the scientific evidence supporting chewing sugarfree gum.

“If you swallow gum, it takes seven years for the body to digest it.”

Although chewing gum is not designed to be swallowed, it passes through the body’s digestive system after a few days in much the same way as roughage.

“Chewing gum has an adverse effect on the digestive system and stomach acid.”

There is no evidence that saliva stimulates gastric juices from the stomach. It is generally accepted that only medication will cause the artificial activation of gastric juices.⁴ When gum is chewed, the flow of saliva increases to almost 10 times the normal rate. Saliva contains bicarbonate, and when swallowed an acid-neutralising effect occurs in the stomach.⁴ We recommend if you have concerns, please speak with a medical professional for further guidance.*

“Gum chewing can cause muscle fatigue and joint problems in the jaw.”

There is no scientific evidence to suggest that chewing gum, along with other jaw habits – such as tooth or jaw clenching, tooth grinding, lip or fingernail biting, and abnormal posturing of the jaws – results in temporomandibular joint diseases (TMD).⁵ While gum chewing, as well as these other jaw habits, cannot cause TMD, they could perpetuate ongoing TMD symptoms. Anyone who believes they are suffering from TMD should seek advice and treatment from their dentist or doctor.

*Research into the effect of gum chewing on people with dyspepsia and ulcers, showed the practice to be harmless even for this highly sensitive patient group.⁴

⁴Oral health and chewing gum FAQs. Accessed: <http://wrigleyoralhealth.com/research/faqs>

⁵Christensen LV, Tran KT, Mohamed SE. “Gum chewing and jaw muscle fatigue and pains.” J Oral Rehabil 1996;23(6):424–37.

⁶Kathleen Doheny. “High Intake of Sorbitol in Gum and Sweets May Cause Extreme Weight Loss”. Medscape. Jan 11, 2008.

⁷Oral Health CRC. Dental Briefing Paper: The potential of sugar-free beverages, sugar-free confectionery and sports drinks to cause dental erosion. Accessed: http://www.oralhealthcrc.org.au/sites/default/files/Dental%20Erosion%20Briefing%20Paper_FINAL2015.pdf

“Chewing sugarfree gum has a laxative effect.”

Most sugarfree gums include sweeteners that, when consumed excessively, can create a laxative effect in some people. It is important to underscore ‘excessive’ in this circumstance.

To reach the threshold of excessive consumption (50g per day according to FDA guidelines)⁶ of Sorbitol through use of gum alone, a person would have to chew close to 50 sticks or 100 pellets of gum daily. Despite this high number, in many countries we do list on the packages of our sugarfree gums that contain these kinds of sweeteners the following statement: “Excessive consumption may produce laxative effects.” We think this approach best informs our consumers of this minor possibility.

It is important to keep in mind that the sweeteners we use are approved safe, thoroughly tested and carefully regulated by regional and international regulatory authorities around the world, including Food Standards Australia New Zealand, as well as by leading scientific organisations.

“The citric acid used in sugarfree gum flavourings causes enamel erosion.”

Under normal consumption conditions, chewing fruit-flavoured, sugarfree gum – which contains low levels of citric acid – is unlikely to lead to tooth enamel erosion. When chewing sugarfree gum, plaque acids including acid-containing flavourings do not remain in extended contact with the tooth surface but are rinsed by the stimulated salivary flow.⁷ Under normal daily consumption, chewing fruit flavoured sugarfree gum is therefore unlikely to lead to erosion.

