SUMMIT
DENTAL ARTS, PC

‘Cavity Free Kids’

Our kids face the highest risk of tooth decay from infancy through adolescence. These cavity prone years are due to many factors, including diets that are often high in sugar consumption (candy, sodas, etc.). Additionally, some young people tend to brush and floss less often than they should.

Dental disease is the most common chronic childhood disease. Pain and suffering from untreated dental disease can lead to problems eating, speaking, and attending to learning. The good news is that dental disease is preventable!

Prevention starts during infancy.

You can help prevent tooth decay for your children by following these tips, starting during infancy:

- Lower the risk of a baby’s infection by improving the oral health of the mother/caregivers which reduces the number of bacteria in their mouths.
- Do not share saliva with the baby through common use of feeding spoons or licking pacifiers and giving them to babies.
- After each feeding, wipe the baby’s gums with a clean, damp gauze pad or washcloth. This will remove plaque and bits of food that can harm erupting teeth. When your child’s teeth begin to erupt, brush them gently with a child’s size toothbrush and water.
- Place only formula, milk or breast milk in bottles. Avoid filling the bottle with liquids such as sugar water, juice or soft drinks.
- As the child grows older, and can be counted on to spit and not swallow toothpaste (usually not before age two), begin brushing the teeth with a pea-sized amount of toothpaste.
- Infants should finish their bedtime and naptime bottles before going to bed.
- If your child uses a pacifier, provide one that is clean — don’t dip it in sugar or honey, or put it in your mouth before giving it to the child.
- Encourage children to drink from a cup by their first birthday and discourage frequent or prolonged use of a training (sippy) cup.
- Help your child brush his or her teeth until he or she is at least six years old.
- Encourage healthy eating habits that include a diet with plenty of vegetables, fruit and whole grains. Serve nutritious snacks and limit sweets to mealtimes.
- Ensure that your child has adequate exposure to fluoride.

Tip for older children, teenagers and adults.

Kids should eat a balanced diet, with a variety of foods. Choose foods from each of the five major food groups:

- breads, cereals and other grain products
- fruits
- vegetables
- meat, poultry and fish
- milk, cheese and yogurt

- Limit the number of sugary snacks. Limit sugary drinks including soda, juice, and some sports drinks as well.

- Provide nutritious snack choices, such as cheese, raw vegetables, plain yogurt, or a piece of fruit.

- Foods that are eaten as part of a meal cause less harm. More saliva is released during a meal, which helps wash foods from the mouth and helps lessen the effects of acids.

- Brush twice a day with fluoride toothpaste. Clean between teeth daily with floss. Rinse teeth daily with a fluoride containing mouthwash.

- Visit the dentist regularly. Your dentist can recommend products to help prevent problems and catch those that do occur while they are small and easier to treat.

What is pH anyway and what does it mean for your oral health?

A normal mouth has a pH of 6.3 to 7, which is close to neutral with no damage done to teeth. Tooth enamel begins to demineralize (dissolve) at pH levels below 5.5. Soda has an average pH of 2.5, which is below this point and very acidic. Enamel is the hardest substance in the body, but it becomes porous and soft when exposed to acid. Tooth enamel erosion is extremely harmful because it weakens the tooth and makes it prone to decay and breakage. Tooth enamel wears out faster when its been weakened. Remember: You have one set of teeth to last you a lifetime.

	pH (acid) Level* Low number = **BAD FOR TEETH**	Sugar Amount** Per 12-ounce serving 1 can
Pure Water	7.00 (Neutral)	0.0
Coffee (Average, Black)	5.00	0.0
Barq's Root Beer	4.61	10.71 tsp.
Diet Dr. Pepper	3.41	0.0
Juicy-Juice (Berry)	3.40	9.75 tsp.
Fresca	3.20	0.0
Diet Sprite	3.17	0.0
Red Bull Energy Drink	3.10	9.29 tsp.
Nestea	3.04	6.07 tsp.
Propel (berry)	3.02	0.71 tsp.
Diet Mountain Dew	2.95	0.0
Dr. Pepper	2.92	9.64 tsp.
Sprite	2.90	9.29 tsp.
Gatorade (Lemon-Lime)	2.83	5 tsp.
Mountain Dew	2.80	11.07 tsp.
Minute Maid Orange Soda	2.80	11.2 tsp.
Diet Pepsi	2.77	0.0
Diet Coke	2.70	0.0
Powerade	2.63	5.36 tsp.
Pepsi	2.43	9.64 tsp.
Coca-Cola	2.30	9.64 tsp.
Battery Acid (Yikes!)	1.00 (Acidic)	0.0

*Acid amounts from the study "Enamel and root surface erosion due to popular U.S. beverages," 2006. Authors: L. Ehlen, T.A. Marshall, F. Qian, J.J. Warren, J. Wefel, M.M. Hogan, and J.D. Harless. College of Dentistry, University of Iowa, Iowa City and from University of Minnesota School of Dentistry, 2000, *Northwest Dentistry* Vol 80, No. 2. **4.2 grams = 1 teaspoon.

How tooth decay starts

- Soda, other soft drinks and some sports drinks have a lot of refined sugar, such as high fructose corn syrup. Bacteria in the mouth process the sugar and produce acid.
- This acid, plus the extra already present in the drink, demineralizes your tooth enamel, the outer coating that guards against decay.
- Tooth decay (cavities) begins when enamel is weakened.
- Each acid attack lasts about 20 minutes, and each sip you take resets the clock.
- Diet or "sugar free" drinks may not have sugar, but usually contain harmful acids.

How to reduce decay

- Choose water; it's best for your hydration and health.
- Don't sip soda, sports drinks or fruit juice all day, drink a serving all at once. Consistent "sipping" exposes teeth to prolonged sugar and acid attacks.
- If you do drink soda, sports drinks or fruit juices, do so in moderation—not more than a 12-ounce serving (1 can) per day. And, it's best to drink it with a meal.
- After having a sugary or acidic drink, brush your teeth. If you can't brush, rinse your mouth with water to dilute the sugar and acid, or chew gum which contains xylitol, a sugar substitute shown to discourage tooth decay.
- Brush at least twice daily with fluoride toothpaste and floss daily to remove plaque buildup between teeth and along gums.

Fluoride

Fluoride is a naturally occurring mineral that is found in many foods and water. Fluoride helps prevent tooth decay by making the tooth more resistant to acid attacks from bacteria in the mouth. In children under six years of age, fluoride becomes incorporated into the development of permanent teeth, making them stronger and therefore more difficult for bacteria to penetrate. Fluoride also helps reverse early decay by remineralizing already erupted teeth of both children and adults.

Fluoride can be directly applied to the teeth at home through fluoridated toothpastes and mouth rinses such as ACT. Your dentist can also apply fluoride to the teeth as a gel, foam, or varnish. These treatments contain a higher level of fluoride than the amount found in toothpastes and mouth rinses. For those without fluoridated water, there are liquids and tablets available that your dentist can prescribe for you.

Dental Sealants

Dental sealants can play an important role in helping to prevent tooth decay.
The placement of dental sealants involves your dentist or hygienist bonding a plastic coating into the grooves of the tooth. The result is a smoother tooth surface, one which is less likely to trap food and plaque and easier to clean with a toothbrush. Sealants are usually also fluoride releasing. Some teeth, especially permanent molars, can be difficult to clean because the grooves on the chewing surface are deep and narrow, and the toothbrush bristles are too large to fit. It is therefore beneficial to have sealants placed on permanent molars as soon as they are visible in the mouth, when your child is six years of age for first molars and then twelve years for second molars, to help prevent cavities from forming.

Discover Xylitol

Xylitol is a white crystalline substance that looks and tastes like sugar and has been found to help prevent cavities. It is a naturally occurring sugar alcohol found in many fruits and vegetables, including berries, mushrooms and lettuce, and is also produced in small amounts by the human body. Xylitol has a wide variety of uses and benefits, from improving the health of your teeth to maintaining upper respiratory health.

Studies show that 6 to 10 grams of xylitol per day are effective to help prevent cavities. Also, using xylitol products 3 to 5 times a day is more effective than only once. Xylitol can be found in gums, mints, and rinses.

Xylitol eliminates harmful oral bacteria (the ones that can damage teeth and gums) and also prevents them from sticking to teeth. Using xylitol immediately after eating or snacking is recommended because if xylitol is the only sugar remaining in the mouth, most bacteria cannot use it and will therefore not be able to make the acids that can attack teeth.

How does the food you eat cause tooth decay?

When you eat, food passes through your mouth. Here it meets the germs, or bacteria, that live in your mouth. You may have heard your dentist talk about plaque. Plaque is a sticky film of bacteria. These bacteria love sugars found in many foods. When you don't clean your teeth after eating, plaque bacteria use the sugar to produce acids that can destroy the hard surface of the tooth, called enamel. After a while, tooth decay occurs. The more often you eat and the longer foods are in your mouth, the more damage occurs.

How do I choose foods wisely?

Some foods that you would least expect contain sugars. Some examples are fruits, milk, bread, cereals, and sports drinks.

The key to choosing foods wisely is not to avoid these foods, but to think before you eat. Not only what you eat but when you eat makes a big difference in your dental health. Eat a balanced diet and limit between-meal snacks and drinking sugary drinks. If you are on a special diet, keep your physician's advice in mind when choosing foods.

The key to Cavity Free Kids is to start early, maintain a healthy diet, develop daily dental hygiene routines, and visit the dentist regularly. Call us for a free consultation!