

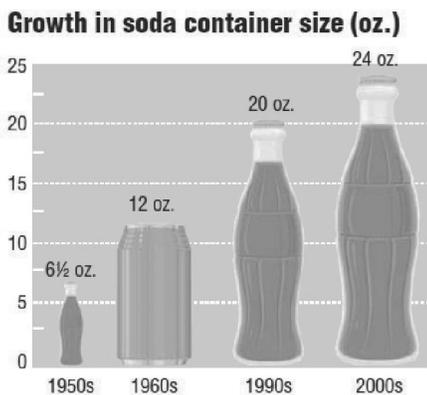
OREGON PUBLIC HEALTH DIVISION • OREGON HEALTH AUTHORITY

**SUGAR-SWEETENED BEVERAGES: SUPERSIZED CONTAINERS AND CONSUMERS**

Over the last three decades, Americans have been supersized. Not surprisingly, this trend parallels the increase in consumption of sugar-sweetened beverages, whose containers have also been super-sized — from 6.5 ounces in the 1950s to 20-ounces or more today (Figure 1).

Containers for fountain drinks are even larger — as an example, a “small” soda at McDonald’s is 16 ounces, while a “Super Size” cup contains 42 ounces.

Figure 1.



People of all ages are consuming more calories than ever before, many of them from sweetened beverages. Drinks sweetened with cane sugar, corn syrup, honey, and other caloric sweeteners now are the biggest single source of calories in the American diet.<sup>1</sup>

This increase in sugar-sweetened beverage consumption has contributed to the obesity epidemic. Growing waist lines are no longer the exception — they’re the norm. Sixty-two percent of Oregon adults are either overweight or obese. Between 1990 and 2007, the adult obesity rate rose 140 percent, from one in 10 to one in four. Among Oregon youth, more than one in five now are overweight or obese, and rates are rising.

This *CD Summary* discusses how the increase in sugar-sweetened beverage consumption is directly linked to the increase in overweight and obesity, diabetes and tooth decay, and what health care providers can do to trim down this statewide epidemic.

**WHAT’S UP WITH SUGAR-SWEETENED DRINKS?**

Carbonated soft drinks are the most popular sugar-sweetened beverages sold, but other drinks are made with caloric sweeteners as well. These include fruit beverages, sports drinks, bottled tea and coffee, and even some flavored waters. Drinks like Gatorade, Kool-Aid, Pepsi, Coke and numerous other brands all are beverages with added sugar. Soda and other sugar-sweetened beverages are no longer a special treat people drink once in a while — rather, they’ve become a regular part of Americans’ diets. These drinks often are sipped throughout the day rather than consumed just at meal time.

In Oregon, more than 177 million gallons of sugar-sweetened beverages are consumed each year.<sup>2,3</sup> That amounts to approximately one gallon per week for every man, woman and child in the state. Nearly 43 percent of Oregon adults report drinking non-diet soda at least once a week and nearly 80 percent of Oregon teens report drinking regular soda at least once a week. According to a survey of mothers, about half of the 2 year-olds in Oregon drink sugar-sweetened beverages at least once a week.

The calories consumed from these beverages are equivalent to more than 82 million pounds of excess weight, so it is not surprising that the majority of Oregonians are now overweight or obese. More than 90 percent of Oregon adults report trying to lose or maintain their weight. Maintaining a healthy weight for every individual, young and old, requires a balance of calories taken in and calories expended. But it takes a lot of exercise to make up

for all the extra calories consumed through sugar-sweetened beverages. For example, a seventh-grader would need to run the length of a football field 50 times to burn off the calories of a single, 20-ounce soda.

**NOT ALL CALORIES ARE EQUAL**

According to the Dietary Guidelines for Americans, for an average 2,000-calorie-per-day diet, the recommended maximum amount of added sugar is 8 teaspoons.<sup>4</sup> With 17 teaspoons of sugar in every 20-ounce



bottle of regular soda, a single bottle exceeds the amount of sugar recommended for a whole day. Sugar-sweetened beverages are different from other sweet snacks, as they contribute extra calories to American diets. In a study at Purdue University, participants were split into two groups — one that consumed 450 calories a day in jelly beans, the other in soda. After a month, researchers found that candy-eaters ate less food, naturally compensating for the calories from the candy. The soda drinkers did not reduce the amount of food eaten, so their caloric intake increased as a result of drinking sugar-sweetened beverages.<sup>5</sup>



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A toddler drinking sugar-sweetened beverages may be starting down the path toward overweight and obesity later in life. Sugar-sweetened beverage consumption among young people often takes the place of drinking milk and water, reducing other nutrients important for growth and development. Recent studies also suggest a higher consumption of sugar-sweetened beverages is associated with the development of diabetes. With the rise in overweight and obesity, and the increase in consumption of sugar-sweetened beverages, diabetes is no longer an adult disease, but one that children now must self-manage and treat. In addition, sugary drinks cause tooth decay, the most common chronic condition among Oregon children.

#### **A LIQUID SWEET RETREAT**

In 2007, Oregon public schools began prohibiting the sale of most sugar-sweetened beverages in vending machines on school property. The result was a decrease in soda consumption among eighth-graders: in 2009, 80 percent of eighth-graders reported drinking non-diet sodas at least once a week, compared with 91 percent in 2003, which shows the value of such programs.

Oregon's Women, Infants and Children (WIC) program also is working to reverse the trends in infant, toddler and youth consumption of sugary drinks. WIC asks mothers about their children's intake of sugary drinks. If a mother reports that her children drink sugary beverages, the family will receive additional support and counseling to reduce sugar-sweetened beverage consumption. WIC promotes the

State of Maine's 5-2-1-0 Program. This program reinforces four messages:

- 5 — Eat at least five fruit and vegetables on most days.
- 2 — Limit screen time to two hours or less daily.
- 1 — Participate in at least one hour or more of physical activity every day.
- 0 — Avoid soda and sugar-sweetened beverages and limit fruit juice to one-half cup or less per day.

Encourage drinking more water — the new Dietary Guidelines for Americans explicitly recommend drinking water instead of sugary drinks — and three to four servings of fat-free milk per day.

Continued coordinated efforts, such as those by WIC, Oregon public schools and worksites, will be necessary to create environments that reduce sugar-sweetened beverage intake, make fruits and vegetables more readily accessible, and increase access to safe, regular physical activity to reduce and prevent obesity.

#### **HELP PATIENTS WEIGH THEIR OPTIONS**

Oregon is pioneering in a health care system that assures that people of all ages have access to basic health care needs and services. It also is a leader in making sure the places where we live, work, play and learn keep us healthy in the first place. Patients listen to their health care providers. Providers can ask their patients about their beverage preferences and encourage them to reduce the amount of sugary drinks they consume as a way to maintain or lose weight. This will also reduce their risk for diabetes and tooth decay.

More than 80 percent of Oregon adults already think drinking one

or more cans of regular soda a day is harmful to their health, so providers likely will discover that patients are receptive to advice to cut down on sugar-sweetened beverage consumption. To lead by example, providers can also remove sugar-sweetened beverages from vending machines at their worksites, and provide healthier options to visitors and staff.

Such small steps will have a huge impact on the state's obesity problem, and over time, the gains no longer will be in Oregonians' body weight.

#### **FOR MORE INFORMATION**

- See Oregon Public Health Division's Health Promotion and Chronic Disease Prevention web site: [www.oregon.gov/DHS/ph/hpcdp/](http://www.oregon.gov/DHS/ph/hpcdp/)
- Centers for Disease Control and Prevention's overweight and obesity web site: [www.cdc.gov/obesity/](http://www.cdc.gov/obesity/)

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