

1. Mark your confusion.
2. Show evidence of a close reading.
3. Write a 1+ page reflection.

### **Eating too much added sugar may be killing you**

*A new study finds that added sugar increases your risk of death from heart disease*

Source: Nanci Hellmich/USA Today

Sugar not only makes you fat, it may be killing you.

Consuming too much added sugar — in regular soda, cakes, cookies and candy — increases your risk of death from heart disease, according to a new study, the largest of its type.

"The risk of cardiovascular disease death increases exponentially as you increase your consumption of added sugar," says the study's lead author, Quanhe Yang, a senior scientist with the Centers for Disease Control and Prevention.

On average, adults in the USA in 2010 consumed about 15% of their daily calories — about 300 calories a day, based on a 2,000-calorie diet — from added sugars. That's far more than the American Heart Association's recommendation that women consume no more than 100 calories a day from added sugars, or about 6 teaspoons of sugar; and men consume no more than 150 calories a day, or about 9 teaspoons. The World Health Organization recommends consuming less than 10% of calories from added sugars.

One can of regular soda contains about 140 calories of added sugar. That's about 7% of the daily calories of someone eating 2,000 calories a day, Yang says.

Added sugars include table sugar, brown sugar, high-fructose corn syrup, maple syrup, honey, molasses and other caloric sweeteners in prepared and processed foods and beverages. It does not include sugars that occur naturally in fruits, fruit juice, and milk and dairy products.

Major sources of added sugars in Americans' diets are sugar-sweetened beverages, desserts, fruit drinks, dairy desserts (ice cream) and candy, Yang says.

Other research has tied a high intake of added sugars, especially sugar-sweetened beverages, to many poor health conditions, including obesity, high blood pressure, type 2 diabetes and risk factors for heart disease and stroke. Most of those studies focused on sugar-sweetened beverages and not total intake of sugar, Yang says. "Ours is the first study using a nationally representative sample to look at the total amount of added sugar and the association to cardiovascular disease death."

To look at trends in added-sugar intake, Yang and colleagues reviewed data from more than 31,000 people over the years who participated in the National Health and Nutrition Examination Survey, which evaluates dietary habits based on in-person interviews. They found that most adults (71%) consume 10% or more of their daily calories from added sugars. About 10% of adults consume 25% or more of daily calories from added sugars.

The researchers also looked at data of deaths from heart disease (heart attacks, stroke, heart failure, hypertension), and they compared added-sugar intake to death from heart disease. They controlled their results for a wide range of heart-disease risk factors, including high blood pressure, total cholesterol, smoking, physical activity, diet and weight.

Among their findings, published online Monday in *JAMA Internal Medicine*:

- People who consumed more than 21% of daily calories from added sugar had double the risk of death from heart disease as those who consumed less than 10% of calories from added sugars.
- A person on a 2,000-calorie diet who consumes 21% of their daily calories from added sugar would be eating 420 calories from added sugar, which would be roughly three cans of regular soda a day.
- People who consumed between 17% to 21% of daily calories from added sugar had a 38% higher risk of death from heart disease than people who consumed less than 10% of calories from added sugars.
- People who consumed seven or more servings a week of sugar-sweetened beverages were at a 29% higher risk of death from heart disease than those who consumed one serving or less.
- The findings were consistent across age groups, sex, physical-activity levels, weights and dietary habits.
- Added sugar intake has changed slightly over the past 20 years, from 16% of daily calories in 1994 to 17% in 2004 to 15% in 2010.

The paper's senior author Frank Hu, a professor of nutrition and epidemiology at the Harvard School of Public Health, says excessive intake of added sugar appears to negatively affect health in several ways. It has been linked to the development of high blood pressure, increased triglycerides (blood fats), low HDL (good) cholesterol, fatty liver problems, as well as making insulin less effective in lowering blood sugar.

Rachel Johnson, a spokeswoman for the American Heart Association and a nutrition professor at the University of Vermont, says, "Now we know that too much added sugar doesn't just make us fat, it increases our risk of death from heart disease."

Johnson says people need to cut back on added sugars. "I continue to be amazed at the added sugars that Americans are consuming. Added sugars do one of two things — they either displace nutritious foods in the diet or add empty calories."

In an accompanying editorial in the medical journal, Laura Schmidt of the University of California-San Francisco writes that the study "underscores the likelihood that, at levels of consumption common among Americans, added sugar is a significant risk factor for cardiovascular disease mortality above and beyond its role as empty calories leading to weight gain and obesity."

The American Beverage Association said in a statement: "This is an observational study which cannot and does not show that cardiovascular disease is caused by drinking sugar-sweetened beverages."

Possible Response Questions:

- Reflect on your intake of sugar. Share your thoughts.
- Comment on the response made by the American Beverage Association.
- Select any passage and respond to it.