

With the sweetness of sugar and almost no calories, is Aspartame too good to be true?





By Julie Sopchak

The World Health Organization (WHO) stirred up a bit of a fuss last month when it designated the artificial sweetener Aspartame as "possibly carcinogenic" after reviewing studies conducted on the substance. But even though "possibly carcinogenic" seems like a death knell, is it as bad as we really think?

What is Aspartame? Known more through brand names **NutraSweet** or **Equal**, it's one of the more common artificial sweeteners used in place of sugar to maintain sweetness in food and drinks without nearly as many calories as real sugar -- diet soda, and other foods labeled as "sugar free."

Involved in hundreds of studies to determine it's safety, Aspartame is the most researched food additive, yet in the official report, the International Agency for Research on Cancer (IARC, it's part of WHO) claimed there were only **three** studies that assessed a link between Aspartame and cancer. Those studies did conclude a positive link between the sweetener and cancer, but the review determined that there were significant limitations with them. In short, the evidence provided was shaky at best. And, even if the evidence was good, there still isn't enough of it.

First, let's talk about Acceptable Daily Intake (ADI): the amount of something that is safe to consume daily. This is determined by finding the highest dose of something at which no negative effects are observed in lifetime studies of animal models (rats, mice) and then dividing that by 100. So someone would have to consume upwards of 100x the

ADI for aspartame every day over the course of their life to potentially see some negative effects. Currently, aspartame's ADI is set at 50 mg/kg/day by the FDA, and to reach that would take a lot. To put it in perspective, if you weigh 150 pounds, you would need to consume about 19 cans of diet soda every day **just to reach the ADI.** To reach a potentially dangerous level, you'd need to consume 100x that amount. **Good luck!**

So basically, the IARC said there's not enough convincing evidence to say that aspartame causes cancer, but they can't definitively rule it out either. They classified it in **Group 2B** for cancer-causing agents, which is the lowest you can get before it's determined non-carcinogenic.

Ultimately, until any new research comes out, you should be fine. So go right ahead and drink those 20 cans of diet soda! Just kidding, please don't do that.

ASPARTAME QUICK FACTS

- 200X SWEETER THAN SUGAR
- ON AVERAGE, WE CONSUME 2-10 MG/KG/DAY
- APPROVED BY FDA; EUROPEAN FOOD SAFETY AUTHORITY; JAPAN MINISTRY OF HEALTH, LABOR, WELFARE; FOOD STANDARDS AUSTRALIA AND NEW ZEALAND
- DISCOVERED BY ACCIDENT IN 1965
- USED IN ABOUT 6,000 DIFFERENT FOODS AND DRINKS WORLDWIDE

APPROVED FOR GENERAL USE IN FOOD IN 1996

IARC CARCINOGEN CLASSIFICATION CHART

GROUP 1 CA

CARCINOGENIC

GROUP 2A

PROBABLY CARCINOGENIC

GROUP 2B

POSSIBLY CARCINOGENIC

GROUP 3 NOT CARCINOGENIC

MONTHLY TRIVIA

What is the <u>longest</u> muscle

in the human body?

Check back next month for the answer! (Or just Google it)

Collegiate Strength Program

College and NEFF athletes will have access to an OPEN GYM format 4:30p-5:30pm on Mondays and Wednesdays to execute programs prescribed to them individually through a NEFF coach.

Training is focused on functional movement patterns and developing strength, power, speed, and agility while reducing injury risk.

The package includes 1:1 training sessions to learn movements which will then be executed independently.