## Halloween trick? Challenges to 'deeply flawed' sugar scare study

## The GLP aggregated and excerpted this blog/article to reflect the diversity of news, opinion and analysis.

A new study claims that obese children could find rapid health improvement by small sugar reductions, without caloric restrictions. According to the lead author, Robert Lustig, the new study shows that sugar may not be harmful because of how it leads to weight gain, but because of its metabolic effect.

Sound too good to be true? Not to the news media, which gobbled up the study's conclusions as the proof that sugar is the big evil in our diet. But, the science in the study is about as good as it is for other fad diets.

## What the study attempted to do

Forty-three obese kids participated in the study, and were provided with nine days of food containing reduced sugar, and a number of medical tests were conducted on them.

Controls. This is not a randomized experiment. The study included *only kids given a special diet* with no control group. It is *possible* that the new reduced-sugar diet resulted in all of the positive effects seen by the researchers. But, without controls, the results are difficult to interpret.

Weight Loss. The study grossly underestimated the number of calories required by the kids to maintain their weight— an error that reflects poor study design.

Statistical Analyses. Finally, the results of this study fail to account for multiple testing, and therefore may be overstating its results independent of the other issues mentioned.

The authors conclude that "Isocaloric fructose restriction improved surrogate metabolic parameters in children with obesity and metabolic syndrome irrespective of weight change." But the claim that the diet contained the same calories as the kids' normal diet is contradicted by their own data.

Read full, original post: Glaring Flaws in Sugar Toxicity Study