



**CALIFORNIA STATE SCIENCE FAIR  
2012 PROJECT SUMMARY**

<b>Name(s)</b> <b>Talia G. Bernstein</b>	<b>Project Number</b> <b>J0502</b>
<b>Project Title</b> <b>Sugar Anyone? A Comparison of Natural and Artificial Sweeteners and the Effects on Blood Glucose</b>	
<p style="text-align: center;"><b>Abstract</b></p> <p><b>Objectives/Goals</b> The purpose of my project is to measure how different sweeteners affect blood glucose and to determine which is the best sweetener to use. This project is important to society because diabetes and obesity are deadly conditions and if it is know which sweeteners are better, it could potentially lower the incidence and prevalence of diabetes and obesity in the world.</p> <p><b>Methods/Materials</b> To conduct this test I used four people, including myself. In the morning, before eating or drinking, I measured glucose levels using a glucometer. Then I mixed 4 oz of water with a packet of Sucralose, Steviol Glycoside, Xylitol, Sugar or Honey. We then drank the mixture, waited 30 minutes and retested glucose levels. I recorded the data over five weeks and graphed the percentage change.</p> <p><b>Results</b> Over the course of five weeks it became evident that Steviol Glycoside had the least affect on glucose levels, on average only 1.3% change. Honey and Xylitol had the most affect on glucose levels,honey on average changed glucose levels 8.4% and Xylitol changed glucose levels 8.3%.</p> <p><b>Conclusions/Discussion</b> In our modern day lives sweeteners are extensively used, some are better than others. If people know which ones are better to use it can help normal people, diabetics and obese people trying to loose weight. After my testing, Steviol Glycoside was shown to be the best. I conducted this test on four people and more studies are needed for more solid data and numbers.</p>	
<b>Summary Statement</b> A comparison of different sweeteners on Blood Glucose	
<b>Help Received</b>	