## SG Weekly: 03-07 Apr 17

## **GARBAGE IN, GARBAGE OUT**

In the burgeoning field of computer science, the term "garbage in, garbage out" refers to the idea that the quality and arrangement of data input into computational algorithms directly corresponds to the output; if you only provide the analytic program with nonsensical or incorrect data, you should expect the results to be equally confounding and lacking in utility.

Why, then, do we oftentimes have different expectations for our bodies? Unlike plants and some bacteria which can absorb light, moisture, and atmospheric gases for fuel, our human bodies run 99.9% off of the substances we put in our mouths. This fuel provides more than just a source of energy for our muscles: complex carbohydrates power our brains, micronutrients (aka vitamins and minerals) are used throughout our bodies to facilitate essential cellular processes, and "good" fats (mono- and poly-unsaturated fats, so-named because their fatty acid tails contain one or more double-Carbon bonds and hence are not fully "saturated" with Hydrogen atoms) can be broken down fairly quickly for energy and may lower cholesterol while improving heart health.

In this day and age of cheap fast food and insta-meals, it can be difficult to balance nutritional needs with the demands of a high-tempo lifestyle. But if your body gets bogged down with high-fat, high-sugar, poor nutritional content fuels, *you'll definitely notice*; common symptoms are constant fatigue and low energy, difficulty concentrating, low motivation, and even depression! Here are some recommendations for fueling your body to better support optimal function:

- Make your meals colorful. A quick guide to the nutritional content of your food is by simply looking at the color! Vary the colors you eat throughout the day, and try to incorporate the whole rainbow, if possible. And no, Skittles and M&Ms don't count.... Google search NDSU's "What color is your food?" for a huge list of colorful options.



- Try to eat 4-5 fruits or vegetables each day. Most of us do a pretty good job of eating our daily share of proteins and carbohydrates...perhaps *too* good a job! Fruits and veggies contain loads of nutritional substances not found in meats and breads, particularly the nutrients our bodies cannot "produce" for themselves. Plus, they provide quicker energy than alternatives.
- **Moderation is key.** Let's be real, our food portion sizes are out of control. Unless you're exercising like an Olympic athlete, you only need about 2,000-2,500 calories daily to *maintain* your current weight. Any excessive calories—even from "healthy" foods—will be stored as fat! Scour the internet, and you'll find dozens of stories about people who claim to have lost weight in ridiculous ways (the "McDonald's Diet" is my favorite), but if you look closely, you'll see the commonality is these folks <u>kept their total daily caloric intake low</u>. I won't recommend an exclusive fast-food diet (see above), but *portion moderation* can go a long way!