What Makes A Runner Run?

Purpose of Activity:

- 1. To introduce youth to the role carbohydrates play in the body
- 2. To introduce the difference between starchy and sugary carbohydrates
- 3. To introduce foods that are good sources of carbohydrates

Materials Needed:

- My Plate diagram;
- Foods With Carbs List (See Chapter 5 resources)

Instructions:

- 1. Write the words "carbohydrate," "starch," and "sugar" on the white board. Ask if anyone knows what they mean.
 - <u>Carbohydrate</u> (sometimes people just say "carbs") = another important nutrient for the body – this one is the easiest for the body to get its energy from
 - <u>Starch</u> = one of the two main kinds of carbohydrate
 - Sugar = the other main kind of carbohydrate)
- 2. Point to the My Plate diagram. Explain that most of our carbohydrates come from the Grain group of foods. But, we also get some healthy carbohydrates from the Fruit and Vegetable groups.
- 3. Ask youth if they know why our bodies need carbohydrates. Using a marathon runner example is a good way to explain the role of carbohydrates, and the differences between starchy and sugary foods.
- 4. Ask participants if they can tell you why long-distance or marathon runners usually eat a huge double portion of spaghetti (or macaroni or some other kind of pasta) the night before the race. Explain the following, as simply as possible:
 - It's easier for our bodies to get energy from carbohydrates than from anything else we eat. That's why runners eat all that pasta before they race.
 - The body turns carbohydrates into sugar. And it's really the sugar that gives us the energy.
 - But then why don't runners eat 10 candy bars the night before they run, instead of lots of spaghetti?
 - Because there is a difference between starch carbohydrates and sugar carbohydrates.
 - The body digests (uses) the starchy foods slowly. So, energy is released to the body slowly and for a pretty long time. For the runner, that's really important. His body keeps getting energy for the whole run, not just for the beginning of it.

- But, sugary foods are different. They get digested really fast. So the body gets a big spurt of energy, but that energy doesn't last very long. Not long enough to help the runner for the whole race.
- So, remember: sugary foods do give us energy. But, that's about all they give us. They don't give us any nutrition at all. They're just a big bunch of calories. Sugar is not an essential food. We don't really need it, because we get energy from other things. That's why we shouldn't eat very much of it.

[Note: the above discussion essentially tells kids about 'simple' and 'complex' carbohydrates without bogging them down with that terminology.]

- 5. Pass out the Foods with Carbs List.
- 6. First, ask youth if they can find foods on the list that are traditional Native foods. Then ask them to put a green check next to their favorite carbs, and a red check next to their least favorite carbs.
- 7. See if they can think of other carbs they really like and add them to the list. Then see if they can tell which of their favorite carbs are starchy or sugary.
- 8. Help them think about which of their favorite carbs they shouldn't eat a lot. Help them find possible substitutes from the foods on the list that they didn't check off.
- 9. End this discussion by asking participants if they can think of something that most Americans eat every day but that our Native ancestors never ate before Europeans came to the Americas.

10. Give them clues:

- Sometimes it's added to things like cereal to make people want to eat them more; it's in cakes and cookies (sugar).
- Before Europeans came here, the only sugar our ancestors ate was the sugar naturally in fruits and vegetables.
- The only food sweeteners that were traditional to Native people were honey and maple syrup. They had lots of exercise and no sugar was added to their food.
 Maybe that's why diabetes wasn't a problem for our communities before.