**Reading Labels to Calculate Sugar Content Name: \_\_\_\_\_\_\_\_\_\_\_**

**How does sugar get in our foods?**

*Naturally occurring* sugars are found naturally in foods such as fruit (fructose) and milk (lactose). *Added* sugars include any sugars that are added to foods or beverages during processing like jams, soft drinks, cereals, etc to enhance flavour, colour and texture. We also add our own sugar during preparation (such as putting sugar in your coffee or adding sugar to your cereal).

**Many names for sugar**: Sugars added to food may be labelled as:

* Artificial Sugars: sucrose, glucose, glucose-fructose (also known as high fructose corn syrup), fructose, maltose, or dextrose
* Natural Sugars: agave syrup, honey, maple syrup, barley malt syrup or fancy molasses, fruit juice and purée concentrates that are added to replace sugars in foods

**Sugars are “empty calories”*.***Most foods that are high in sugar have *little nutritional value*. When we eat sugar, it satisfies our hunger and therefore we eat less of the healthy foods. Excess sugar our body does not use for energy right away gets *stored as fat*. Excess consumption of sugar can lead to *obesity*.  Obesity is a risk factor for chronic conditions including *cardio-vascular disease*, *type 2 diabetes* and certain types of *cancer*.  Health Canada recommends that most of your consumption of sugar come from fruits, vegetables and milk.

**How much sugar do we need?**

Because sugar is found naturally in many foods, it is difficult to put an exact number on how much sugar should be in your diet.  For labelling purposes, a daily value for sugar consumption has been set at **100 g**, which is close to the average level of consumption of total sugars in Canada.  When packaged food with added sugar contains only 5% or less or our daily value, this is considered a little. Foods containing more than 15% of our daily value is considered a lot.

**What do the different Sugar Labels *mean*?**

* *Sugar Free* means less than 0.5 grams of sugars, both natural and added per serving.
* Re*duced Sugar* means 25% less sugars than the regular version of the product.
* *No Added Sugar* means no sugar was added during processing or packaging

**Questions**

1. List 3 *artificial* sugars and 3 *natural sugars that may be added to processed foods.*
2. Why are added sugars called “empty calories”?
3. Why is it difficult to calculate total sugar consumption from the foods we eat?
4. Go to<https://www.caffeineinformer.com/sugar-in-drinks> Find your favorite beverage (or one you might like to try) from the list. How much sugar are you consuming each time you drink one?

Name of beverage: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Total Sugar consumed: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

What percent of our daily sugar intake is this? \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Is this “a little bit” or “ a lot”? \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

1. We all need sugar for energy but too much sugar is bad for us. From the link, what are the 8 health concerns associated with consuming too much sugar in drinks and other foods
2. Examine the labels below and find the amount of sugar each item contains.



|  |  |  |  |
| --- | --- | --- | --- |
|  | A | B | C |
| Amount of Sugar (g) per serving |  |  |  |
| Serving Size (mL) |  |  |  |
| Amount of sugar per 250mL serving |  |  |  |
| Percent of Daily intake |  |  |  |
| Is this a little (5%) or a lot (>15%) ? |  |  |  |

**Comparing Labels Assignment**

Purpose: To compare sugar content inprocessed foods and rate them on sugar content.

1. Select a category from below.Look upnutrition labels of *3-4 different brands* of foodsfrom that category:
	* Pop, energy drinks, juice
	* Specialty coffees
	* granola bar, chocolate bar, protein bar, meal replacement bar,
	* breakfast cereal, granola cereal, oatmeal
	* yogurt
	* salad dressings
	* Condiments: ketchup, mayonnaise, mustard, jam
2. Complete the chart with name of products, serving size on label and sugar content. Choose an appropriate serving size for all then calculate the sugar foreach product for the new standardized serving size.*Show your calculations.*

|  |  |  |  |
| --- | --- | --- | --- |
| Brand:  |  |  |  |
| Amount of Sugar (g)  |  |  |  |
| Serving Size (mL) |  |  |  |
| Amount of sugar for standardized serving size |  |  |  |
| Percent of Daily intake |  |  |  |
| Is this a little (5%) or a lot (>15%) ? |  |  |  |

1. **Graph your results** in a bar graph for each food item.

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**Reflection:**

1. Which product was most surprising to you?
2. Do you think the general public understands how much sugar is in our processed foods?
3. How will these results affect your future decision when purchasing this type of product?
4. Evaluate each product and decide which one you would recommend as the best option. Consider not only sugar content but also taste and convenience. Please use COMPLETE SENTENCES.

**Self-Assess:**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| How did you do?  | 1 | 2 | 3 | 4 |
| Did you show your calculations neatly? |  |  |  |  |
| Did you use complete sentences? |  |  |  |  |
| Is your graph neat and easy to understand? |  |  |  |  |
| Did you give your graph an appropriate title? |  |  |  |  |
| Did you label each axis? |  |  |  |  |
| Will the reader know what serving size you chose?  |  |  |  |  |