



## **You Are In Charge!** **Healthy Living=Healthy Choices**

We fuel our bodies with energy from the healthy foods that we eat. Our size and our health are determined in part by genetics, but primarily by how we live our lives. The balancing act of energy input versus energy expenditure is determined by the choices we make every day.

### **Learning How to Take Control**



#### **What is physical activity? ENERGY EXPENDITURE**

Physical activity simply means movement of the body that uses energy. Walking, gardening, briskly pushing a baby stroller, climbing the stairs, playing soccer, or dancing the night away are all good examples of being active. For health benefits, physical activity should be moderate or vigorous intensity.

#### **Moderate physical activities include:**

- Walking briskly (about 3 ½ miles per hour)
- Bicycling (less than 10 miles per hour)
- General gardening (raking, trimming shrubs)
- Dancing
- Golf (walking and carrying clubs)
- Water aerobics
- Canoeing
- Tennis (doubles)

#### **Vigorous physical activities include:**

- Running/jogging (5 miles per hour)
- Walking very fast (4 ½ miles per hour)
- Bicycling (more than 10 miles per hour)
- Heavy yard work, such as chopping wood
- Swimming (freestyle laps)
- Aerobics
- Basketball (competitive)
- Tennis (singles)

You can choose moderate or vigorous intensity activities, or a mix of both each week. Activities can be considered vigorous, moderate, or light in intensity. This depends on the extent to which they make you breathe harder and your heart beat faster. Only moderate and vigorous intensity activities count toward meeting your physical activity needs. With vigorous activities, you get similar health benefits in half the time it takes you with moderate ones. You can replace some or all of your moderate activity with vigorous activity. Although you are moving, light intensity activities do not increase your heart rate, so you should not count these towards meeting the physical activity recommendations. These activities include walking at a casual pace, such as while grocery shopping, and doing light household chores.

## Tips for increasing physical activity

### Make physical activity a regular part of the day

Choose activities that you enjoy and can do regularly. Fitting activity into a daily routine can be easy — such as taking a brisk 10 minute walk to and from the parking lot, bus stop, or subway station. Or, join an exercise class. Keep it interesting by trying something different on alternate days. Every little bit adds up and doing something is better than doing nothing. Make sure to do at least 10 minutes of activity at a time, shorter bursts of activity will not have the same health benefits. For example, walking the dog for 10 minutes before and after work or adding a 10 minute walk at lunchtime can add to your weekly goal. Mix it up. Swim, take a yoga class, garden or lift weights. To be ready anytime, keep some comfortable clothes and a pair of walking or running shoes in the car and at the office.



### More ways to increase physical activity

#### At home:

- Join a walking group in the neighborhood or at the local shopping mall. Recruit a partner for support and encouragement. Push the baby in a stroller.
- Get the whole family involved — enjoy an afternoon bike ride with your kids.
- Walk up and down the soccer or softball field sidelines while watching the kids play.
- Walk the dog — don't just watch the dog walk.
- Clean the house or wash the car.
- Walk, skate, or cycle more, and drive less.
- Do stretches, exercises, or pedal a stationary bike while watching television.
- Mow the lawn with a push mower.
- Plant and care for a vegetable or flower garden.
- Play with the kids — tumble in the leaves, build a snowman, splash in a puddle, or dance to favorite music.
- Exercise to a workout video such as Dance Dance Revolution



#### At work:

- Get off the bus or subway one stop early and walk or skate the rest of the way.
- Replace a coffee break with a brisk 10-minute walk. Ask a friend to go with you.
- Take part in an exercise program at work or a nearby gym.
- Join the office softball team or walking group.



**At play:**

- Walk, jog, skate, or cycle.
- Swim or do water aerobics.
- Take a class in martial arts, dance, or yoga.
- Golf (pull cart or carry clubs).
- Canoe, row, or kayak.
- Play racket ball, tennis, or squash.
- Ski cross-country or downhill.
- Play basketball, softball, or soccer.
- Hand cycle or play wheelchair sports.
- Take a nature walk.
- Most important – have fun while being active!



**Eating Food=Energy Input**

**What source of energy are you fueling up with?**

**Food Groups**

				
<b>Grains Group</b>	<b>Vegetable Group</b>	<b>Fruit Group</b>	<b>Dairy Group</b>	<b>Protein Foods Group</b>
Make at least half your grains whole.	Vary your veggies.	Focus on fruits.	Get your calcium-rich foods.	Go lean with protein.



**What foods are in the Grains Group?**

Any food made from wheat, rice, oats, cornmeal, barley or another cereal grain is a grain product. Bread, pasta, oatmeal, breakfast cereals, tortillas, and grits are examples of grain products.

Grains are divided into 2 subgroups, **whole grains** and **refined grains**.

Whole grains contain the entire [grain kernel](#) — the bran, germ, and endosperm. Examples include:

- whole-wheat flour
- bulgur (cracked wheat)
- oatmeal
- whole cornmeal
- brown rice

Refined grains have been milled, a process that removes the bran and germ. This is done to give grains a finer texture and improve their shelf life, but it also removes dietary fiber, iron, and many B vitamins. Some examples of refined grain products are:

- white flour
- degermed cornmeal
- white bread
- white rice

Most refined grains are *enriched*. This means certain B vitamins (thiamin, riboflavin, niacin, folic acid) and iron are added back after processing. Fiber is not added back to enriched grains. Check the ingredient list on refined grain products to make sure that the word “enriched” is included in the grain name. Some food products are made from mixtures of whole grains and refined grains.

Some commonly eaten grain products

**Whole grains:**

amaranth  
[brown rice](#)  
buckwheat  
bulgur (cracked wheat)  
millet  
[oatmeal](#)  
[popcorn](#)

*Ready-to-eat breakfast cereals:*

[whole wheat cereal flakes](#)  
muesli

rolled oats  
quinoa  
sorghum  
triticale  
whole grain barley  
whole grain cornmeal  
whole rye  
[whole wheat bread](#)  
[whole wheat crackers](#)  
whole wheat pasta  
whole wheat sandwich buns and rolls  
whole wheat tortillas  
wild rice

**Refined grains:**

[cornbread\\*](#)  
corn tortillas\*  
couscous\*  
[crackers\\*](#)  
[flour tortillas\\*](#)  
grits  
noodles\*

*Pasta: \**

spaghetti  
macaroni

pitas\*  
pretzels

*Ready-to-eat breakfast cereals:*

[corn flakes](#)  
  
white bread  
[white sandwich buns and rolls](#)  
[white rice](#)

\* Most of these products are made from refined grains. Some are made from whole grains. Check the ingredient list for the words “whole grain” or “whole wheat” to decide if they are made from a whole grain. Some foods are made from a mixture of whole and refined grains.

Some grain products contain significant amounts of bran. Bran provides fiber, which is important for health. However, products with added bran or bran alone (e.g., oat bran) are not necessarily whole grain products.

**Key Consumer Message:** *Make at least half your grains whole grains*



## What foods are in the Vegetable Group?

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Any vegetable or 100% vegetable juice counts as a member of the Vegetable Group. Vegetables may be raw or cooked; fresh, frozen, canned, or dried/dehydrated; and may be whole, cut-up, or mashed.

Vegetables are organized into 5 subgroups, based on their nutrient content. Some commonly eaten vegetables in each subgroup are:

### Dark green vegetables

bok choy  
broccoli  
collard greens  
dark green leafy lettuce  
kale  
mesclun  
mustard greens  
romaine lettuce  
spinach  
turnip greens  
watercress

### Red & orange vegetables

acorn squash  
butternut squash  
carrots  
hubbard squash  
pumpkin  
red peppers  
sweet potatoes  
tomatoes  
tomato juice

### Beans and peas\*

black beans  
black-eyed peas (mature, dry)  
garbanzo beans (chickpeas)  
kidney beans  
lentils  
navy beans  
pinto beans  
soy beans  
split peas  
white beans

### Starchy vegetables

cassava  
corn  
fresh cowpeas, field peas, or black-eyed peas (not dry)  
green bananas  
green peas  
green lima beans  
plantains  
potatoes  
taro  
water chestnuts

### Other vegetables

artichokes  
asparagus  
avocado  
bean sprouts  
beets  
Brussels sprouts  
cabbage  
cauliflower  
celery  
cucumbers  
eggplant  
green beans  
green peppers  
iceberg (head) lettuce  
mushrooms  
okra  
onions  
parsnips  
turnips  
wax beans  
zucchini

**Key Consumer Message:** *Make half your plate fruits and vegetables*



## What foods are in the Fruit Group?

Any fruit or 100% fruit juice counts as part of the Fruit Group. Fruits may be fresh, canned, frozen, or dried, and may be whole, cut-up, or pureed. Some commonly eaten fruits are:

Apples  
Apricots  
Bananas

*Berries:*  
strawberries  
blueberries  
raspberries

Cherries  
Grapefruit  
Grapes  
Kiwi fruit  
Lemons  
Limes  
Mangoes

*Melons:*  
cantaloupe  
honeydew  
watermelon

*Mixed fruits:*  
fruit cocktail

Nectarines  
Oranges  
Peaches  
Pears  
Papaya  
Pineapple  
Plums  
Prunes  
Raisins  
Tangerines

*100% Fruit juice:*  
orange  
apple  
grape  
grapefruit



## What foods are included in the Dairy Group?

All fluid milk products and many foods made from milk are considered part of this food group. Most Dairy Group choices should be fat-free or low-fat. Foods made from milk that retain their calcium content are part of the group. Foods made from milk that have little to no calcium, such as cream cheese, cream, and butter, are not. Calcium-fortified soymilk (soy beverage) is also part of the Dairy Group.

Some commonly eaten choices in the Dairy Group are:

**Milk\***  
all fluid milk:  
fat-free (skim)  
low fat (1%)  
reduced fat (2%)  
whole milk

**Cheese\***  
hard natural cheeses:  
cheddar  
mozzarella  
Swiss  
Parmesan

flavored milks:  
chocolate  
strawberry

lactose-reduced milks  
lactose-free milks

**Milk-based desserts\***

puddings  
ice milk  
frozen yogurt  
ice cream

**Calcium-fortified soymilk  
(soy beverage)**

**\*Selection Tips**

Choose fat-free or low-fat milk, yogurt, and cheese. If you choose milk or yogurt that is not fat-free, or cheese that is not low-fat, the fat in the product counts against your maximum limit for "empty calories" (calories from solid fats and added sugars).

soft cheeses:  
ricotta  
cottage cheese

processed cheeses:  
American

**Yogurt\***

all yogurt:  
fat-free  
low fat  
reduced fat  
whole milk yogurt

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If sweetened milk products are chosen (flavored milk, yogurt, drinkable yogurt, desserts), the added sugars also count against your maximum limit for "empty calories" (calories from solid fats and added sugars).

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For those who are lactose intolerant, smaller portions (such as 4 fluid ounces of milk) may be well tolerated. Lactose-free and lower-lactose products are available. These include lactose-reduced or lactose-free milk, yogurt, and cheese, and calcium-fortified soymilk (soy beverage). Also, enzyme preparations can be added to milk to lower the lactose content. Calcium-fortified foods and beverages such as cereals, orange juice, or rice or almond beverages may provide calcium, but may not provide the other nutrients found in dairy products.

**Key Consumer Message:** *Switch to fat-free or low-fat (1%) mil*



**What foods are in the Protein Foods Group?**

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All foods made from meat, poultry, seafood, beans and peas, eggs, processed soy products, nuts, and seeds are considered part of the Protein Foods Group. Beans and peas are also part of the Vegetable Group. For more information on beans and peas, see [Beans and Peas Are Unique Foods](#).

Select a variety of protein foods to improve nutrient intake and health benefits, including at least 8 ounces of cooked seafood per week. Young children need less, depending on their age and calories needs. The advice to consume seafood does not apply to vegetarians. Vegetarian options in the Protein Foods Group include beans and peas, processed soy products, and nuts and seeds. Meat and poultry choices should be lean or low-fat.

Some commonly eaten choices in the Protein Foods Group, with selection tips, are:

**Meats\****Lean cuts of:*beef  
ham  
lamb  
pork  
veal*Game meats:*bison  
rabbit  
venison*Lean ground meats:*beef  
pork  
lamb*Lean luncheon or deli meats**Organ meats:*liver  
giblets**Poultry\***chicken  
duck  
goose  
turkey  
ground chicken and turkey**Eggs\***chicken eggs  
duck eggs**Beans and peas**black beans  
black-eyed peas  
chickpeas (garbanzo beans)  
falafel  
kidney beans  
lentils  
lima beans (mature)  
navy beans  
pinto beans  
soy beans  
split peas*Processed soy products:*tofu (bean curd made from  
soybeans)  
white beans  
bean burgers  
veggie burgers  
tempeh  
texturized vegetable  
protein (TVP)**Nuts and seeds\***almonds  
cashews  
hazelnuts (filberts)  
mixed nuts  
peanuts  
peanut butter  
pecans  
pistachios  
pumpkin seeds  
sesame seeds  
sunflower seeds  
walnuts**Seafood\****Finfish such as:*catfish  
cod  
flounder  
haddock  
halibut  
herring  
mackerel  
pollock  
porgy  
salmon  
sea bass  
snapper  
swordfish  
trout  
tuna*Shellfish such as:*clams  
crab  
crayfish  
lobster  
mussels  
octopus  
oysters  
scallops  
squid (calamari)  
shrimp*Canned fish such as:*anchovies  
clams  
tuna  
sardines**\*Selection Tips**

Choose lean or low-fat meat and poultry. If higher fat choices are made, such as regular ground beef (75 to 80% lean) or chicken with skin, the fat counts against your maximum limit for **empty calories** (calories from solid fats or added sugars). \_\_\_\_\_

If solid fat is added in cooking, such as frying chicken in shortening or frying eggs in butter or stick margarine, this also counts against your maximum limit for **empty calories** (calories from solid fats and added sugars). \_\_\_\_\_

Select some seafood that is rich in omega-3 fatty acids, such as salmon, trout, sardines, anchovies, herring, Pacific oysters, and Atlantic and Pacific mackerel. \_\_\_\_\_

Processed meats such as ham, sausage, frankfurters, and luncheon or deli meats have added sodium. Check the **Nutrition Facts label** to help limit sodium intake. Fresh chicken, turkey, and pork that have been enhanced with a salt-containing solution also have added sodium. Check the product label for statements such as "self-basting" or "contains up to \_\_\_% of \_\_\_", which mean that a sodium-containing solution has been added to the product. \_\_\_\_\_

Choose unsalted nuts and seeds to keep sodium intake



# WHOA FOODS



## Empty Calories: What are "empty calories"?

Currently, many of the foods and beverages Americans eat and drink contain **empty calories** – calories from solid fats and/or added sugars. Solid fats and added sugars add calories to the food but few or no nutrients. For this reason, the calories from solid fats and added sugars in a food are often called empty calories. Learning more about solid fats and added sugars can help you make better food and drink choices.

**Solid fats** are fats that are solid at room temperature, like butter, beef fat, and shortening. Some solid fats are found naturally in foods. They can also be added when foods are processed by food companies or when they are prepared.

**Added sugars** are sugars and syrups that are added when foods or beverages are processed or prepared. Solid fats and added sugars can make a food or beverage more appealing, but they also can add a lot of calories. The foods and beverages that provide the most empty calories for Americans are:

- Cakes, cookies, pastries, and donuts (contain both solid fat and added sugars)
- Sodas, energy drinks, sports drinks, and fruit drinks (contain added sugars)
- Cheese (contains solid fat)
- Pizza (contains solid fat)
- Ice cream (contains both solid fat and added sugars)
- Sausages, hot dogs, bacon, and ribs (contain solid fat)

These foods and beverages are the major sources of empty calories, but many can be found in forms with less or no solid fat or added sugars. For example, low-fat cheese and low-fat hot dogs can be purchased. You can choose water, milk, or sugar-free soda instead of drinks with sugar. Check that the calories in these products are less than in the regular product.

In some foods, like most candies and sodas, **all** the calories are empty calories. These foods are often called "empty calorie foods." However, empty calories from solid fats and added sugars can also be found in some other foods that contain important nutrients. Some examples of foods that provide nutrients, shown in forms with and without empty calories are:

Food with <u>some</u> empty calories	Food with <u>few or no</u> empty calories
Sweetened applesauce (contains added sugars)	Unsweetened applesauce
Regular ground beef (75% lean) (contains solid fats)	Extra lean ground beef (90% or more lean)
Fried chicken (contains solid fats from frying and skin)	Baked chicken breast without skin
Sugar-sweetened cereals (contain added sugars)	Unsweetened cereals
Whole milk (Contains solid fats)	Fat-free milk

Making better choices, like unsweetened applesauce or extra lean ground beef, can help keep your intake of added sugars and solid fats low.

**A small amount of empty calories is okay, but most people eat *far more* than is healthy.** It is important to limit empty calories to the amount that fits your calorie and nutrient needs. You can lower your intake by eating and drinking foods and beverages containing empty calories *less often* or by decreasing the *amount* you eat or drink.

**Key Consumer Messages:**

- *Enjoy your food, but eat less.*
- *Avoid oversized portions.*
- *Drink water instead of sugary drinks.*

**Taking a Closer Look At Labels**

**Start here**

**Check calories**

**Limit these Nutrients**

**Get enough of These nutrients**

**Quick Guide to % Daily Value:**

**5% or less is low**

**20% or more is high**

Chicken Noodle Soup			
<b>Nutrition Facts</b>			
Serving Size 1/2 cup (120 ml) condensed soup			
Servings Per Container about 2.5			
Amount Per Serving			
<b>Calories</b>	60	<b>Calories from Fat</b>	15
		% Daily Value*	
<b>Total Fat</b>	1.5g		2%
Saturated Fat	0.5g		3%
Trans Fat	0g		
<b>Cholesterol</b>	15mg		
<b>Sodium</b>	890gm		37%
<b>Total Carbohydrate</b>	8g		3%
Dietary Fiber	1g		4%
Sugars	1g		
<b>Protein</b>	3g		
<b>Vitamin A</b>	4%	<b>Calcium</b>	0%
<b>Vitamin C</b>	0%	<b>Iron</b>	2%
*Percent Daily Values are based on a 2,000 calorie diet. Your Daily Values may be higher or lower depending on your calorie needs.			
		Calories	2000      2500
Total Fat	Less than	65g	80g
Sat Fat	Less than	20g	25g
Cholesterol	Less than	300mg	300mg
Sodium	Less than	2,400m	2400mg
Total Carbohydrate		300g	375g
Dietary Fiber		25g	30g

The information on the left side of the label provides total amounts of different nutrients per serving. To make wise food choices, check the total amounts for:

- calories
- total fat
- sodium
- total carbohydrate
- fiber
- sugar alcohol
- list of ingredients

### **Using the information found in total amounts**

Total amounts are shown in grams, abbreviated as g, or in milligrams, shown as mg. A gram is a very small amount and a milligram is one-thousandth of that. For example, a nickel weighs about 5 grams. So does a teaspoonful of margarine. Use the label to compare labels of similar foods. For example, choose the product with a smaller amount of saturated fat, cholesterol, and sodium and try to select foods with more fiber.

### **Calories**

If you are trying to lose or maintain your weight, the number of calories you eat counts. To lose weight you need to eat fewer calories than your body burns. You can use the labels to compare similar products and determine which contains fewer calories. To find out how many calories you need each day, talk with your dietitian or certified diabetes educator.

### **Total Fat**

Total fat tells you how much fat is in a food per serving. It includes fats that are good for you such as mono and polyunsaturated fats, and fats that are not so good such as saturated and trans fats. Mono and polyunsaturated fats can help to lower your blood cholesterol and protect your heart. Saturated and trans fat can raise your blood cholesterol and increase your risk of heart disease. The cholesterol in food may also increase your blood cholesterol.

Fat is calorie-dense. Per gram, it has more than twice the calories of carbohydrate or protein. Although some types of fats, such as mono and polyunsaturated fats provide your body with healthy fats, it is still important to pay attention to the overall number of calories that you consume to maintain a healthy weight.

### **Sodium**

Sodium does not affect blood glucose levels. However, many people eat much more sodium than they need. Table salt is very high in sodium. You might hear people use "sodium" in lieu of "table salt," or vice versa.

With many foods, you can taste how salty they are, such as pickles or bacon. But there is also hidden salt in many foods, like cheeses, salad dressings, canned soups and other packaged foods. Reading labels can help you compare the sodium in different foods. You can also try using herbs and spices in your cooking instead of adding salt. Adults should aim for less than 2300 mg per day. If you have high blood pressure, it may be helpful to eat less.

### **Total Carbohydrate**

If you are carbohydrate counting, the food label can provide you with the information you need for meal planning. Look at the grams of total carbohydrate, rather than the grams of sugar. Total carbohydrate on the label includes sugar, complex carbohydrate, and fiber. If you look only at the sugar number, you may end up excluding nutritious foods such as fruits and milks thinking they are too high in sugar. You might also overeat foods such as cereals and grains that have no natural or added sugar, but do contain a lot of carbohydrate.

The grams of sugar and fiber are counted as part of the grams of total carbohydrate. If a food has 5 grams or more fiber in a serving, subtract half the fiber grams from the total grams of carbohydrate for a more accurate estimate of the carbohydrate content.

### **Fiber**

Fiber is part of plant foods that is not digested – or for some types, only partially digested. Dried beans such as kidney or pinto beans, fruits, vegetables and grains are all good sources of fiber. The recommendation is to eat 25-30 grams of fiber per day. People with diabetes need the same amount of fiber as everyone else for good health.

### **Sugar Alcohols**

Sugar alcohols (also known as polyols) include sorbitol, xylitol and mannitol, and have fewer calories than sugars and starches. Use of sugar alcohols in a product does not necessarily mean the product is low in carbohydrate or calories. And, just because a package says "sugar-free" on the outside, that does not mean that it is calorie or carbohydrate-free. Always remember to check the label for the grams of carbohydrate and calories.

### **List of Ingredients**

Ingredients are listed in descending order by weight, meaning the first ingredient makes up the largest proportion of the food. Check the ingredient list to spot things you'd like to avoid, such as coconut oil or palm oil, which are high in saturated fat. Also try to avoid hydrogenated oils that are high in trans fat. They are not listed by total amount on the label, but you can choose foods that don't list hydrogenated or partially hydrogenated oil in the ingredient list.

The ingredient list is also a good place to look for heart-healthy ingredients such as soy; monounsaturated fats such as olive, canola or peanut oils; or whole grains, like whole wheat flour and oats

[www.diabetes.org/food-and-fitness/food/what-can-i-eat/taking-a-closer-look-at-labels.html](http://www.diabetes.org/food-and-fitness/food/what-can-i-eat/taking-a-closer-look-at-labels.html)

### **Please see the following resources for additional educational and personal support.**

[www.choosemyplate.gov/](http://www.choosemyplate.gov/)

[www.choosemyplate.gov/tools.html](http://www.choosemyplate.gov/tools.html)

[www.myfoodapedia.gov/](http://www.myfoodapedia.gov/)

[www.mypyramidtracker.gov/](http://www.mypyramidtracker.gov/) ; [www.teamnutrition.usda.gov/resources/mpk\\_worksheet.pdf](http://www.teamnutrition.usda.gov/resources/mpk_worksheet.pdf)

[www.diabetes.org/food-and-fitness](http://www.diabetes.org/food-and-fitness)

[forecast.diabetes.org/food-recipes](http://forecast.diabetes.org/food-recipes)

[forecast.diabetes.org/magazine/features/the-3-1-meal-plan](http://forecast.diabetes.org/magazine/features/the-3-1-meal-plan)

[www.diabetes.org/food-and-fitness/food/what-can-i-eat/making-healthy-food-choices.html](http://www.diabetes.org/food-and-fitness/food/what-can-i-eat/making-healthy-food-choices.html)




## Why is it important to maintain a healthy weight?

Reaching and maintaining a healthy weight is important for your overall health and well being. If you are significantly overweight, you have a greater risk of developing many diseases including high blood pressure, Type 2 diabetes, stroke, and some forms of cancer. For obese adults, even losing a few pounds or preventing further weight gain has health benefits.

### How can I maintain or move toward a healthy weight?

Reaching a healthier weight is a balancing act. The secret is learning how to balance your “energy in” and “energy out” over the long run. “Energy in” is the calories from the foods and beverages you have each day. “Energy out” is the calories you burn for basic body functions and physical activity.

Look at this chart to find where your energy balance is:

<p><b>Maintaining weight</b></p>	<p>Energy In = Energy Out</p> 	<p>Your weight will stay the same when the calories you eat and drink equal the calories you burn.</p>
<p><b>Losing weight</b></p>	<p>Energy In &lt; Energy Out</p> 	<p>You will lose weight when the calories you eat and drink are less than the calories you burn.</p>
<p><b>Gaining weight</b></p>	<p>Energy In &gt; Energy Out</p> 	<p>You will gain weight when the calories you eat and drink are greater than the calories you burn.</p>

Which box did you choose? Where would you like to be? Many people want to lose weight. To do this the strategy is simple – the challenge is putting it into practice every day. If you are overweight or obese, here are some basic steps to help you gradually move toward a healthier weight:

- 1) Learn what to eat from each food group.
- 2) Focus on how much you eat. Watch your portion sizes!
- 3) Choose “nutrient-dense” forms of foods. These foods are packed with nutrients, but low in “extras” that just add calories.
- 4) **Get moving!** Physical activity can help you reach and keep a healthier weight.
- 5) Follow your progress by tracking your food intake and physical activity. Check your weight weekly.

# Estimated Calorie Requirements

**Chart 1: To be used with student lessons below**

This calorie requirement chart presents estimated amounts of calories needed to maintain energy balance (and a healthy body weight) for various gender and age groups at three different levels of physical activity. The estimates are rounded to the nearest 200 calories and were determined using an equation from the Institute of Medicine (IOM).

**Estimated Calorie Requirements (in kilocalories) for Each Gender and Age Group at Three Levels of Physical Activity.**

Gender	Age (years)	Activity Level		
		Sedentary	Moderately Active	Active
<b>Child</b>	2-3	1,000	1,000 - 1,400	1,000 - 1,400
<b>Female</b>	4 - 8	1,200	1,400 - 1,600	1,400 - 1,800
<b>Female</b>	9-13	1,600	1,600 - 2,000	1,800 - 2,000
<b>Female</b>	14-18	1,800	2,000	2,400
<b>Female</b>	19-30	2,000	2,000 - 2,200	2,400
<b>Female</b>	31-50	1,800	2,000	2,200
<b>Female</b>	51+	1,600	1,800	2,000 - 2,200
<b>Male</b>	4-8	1,400	1,400 - 1,600	1,600 - 2,000
<b>Male</b>	9-13	1,800	1,800 - 2,200	2,000 - 2,600
<b>Male</b>	14-18	2,200	2,400 - 2,800	2,800 - 3,200
<b>Male</b>	19-30	2,400	2,600 - 2,800	3,000
<b>Male</b>	31-50	2,200	2,400 - 2,600	2,800 - 3,000
<b>Male</b>	51+	2,000	2,200 - 2,400	2,400 - 2,800

Source: HHS/USDA Dietary Guidelines for Americans: 2005

## How many calories does physical activity use?

**cal-o-rie** (kă'ă-lē'ə-rē) *n.*

A unit of energy-producing potential supplied by food and released upon oxidation by the body, equal to the amount of energy required to raise the temperature of 1 kilogram of water by 1°C at one atmosphere pressure. Also called *nutritionist's calorie*.

**Chart 2: To be used with student lessons below** A 154-pound person will use up about the number of calories listed doing each activity below. Those who weigh more will use more calories, and those who weigh less will use fewer. The calorie values listed include both calories use by the activity and the calories used for normal body functioning.

Moderate physical activities:	Approximate calories used by a 154-pound person	
	In 1 hour	In 30 minutes
Hiking	370	185
Light gardening/yard work	330	165
Dancing	330	165
Bicycling (less than 10 miles per hour)	290	145
Walking (3 ½ miles per hour)	280	140
Weight Lifting (general light workout)	220	110
Stretching	180	90
Vigorous physical activities:	In 1 hour	In 30 minutes
Running/Jogging (5 miles per hour)	590	295
Bicycling (greater than 10 miles per hour)	590	295
Swimming (slow freestyle laps)	510	255
Aerobics	480	240
Walking (4 ½ miles per hour)	460	230
Heavy Yard Work (chopping wood)	440	220
Weight Lifting (vigorous effort)	440	220
Basketball (vigorous)	440	220

\*<http://www.fns.usda.gov/eatsmartplayhardhealthylifestyle/Tools/calorieburnerchart.htm>

# Steps to a Healthier Weight Worksheet

Use the charts and the basic principles from above to solve the answers to each word problem. \*The caloric information is obtained from: [www.MyFood-a-pedia.gov](http://www.MyFood-a-pedia.gov)

1. Bianca is 13 years old, female and moderately active.
  - a. What are her daily estimated calorie requirements according to the chart above?
  - b. Bianca ate the following:

## BREAKFAST

Frosted donut	251 calories
Chocolate milk	175 calories

## LUNCH

Quarter pound cheeseburger	574 calories
Large french fries	539 calories
32 oz regular soft drink	155 calories
Ice cream cone	267 calories

## DINNER

2 slices pepperoni pizza	395 calories
Potato chips	107 calories
Fruit punch	179 calories

How many calories did she consume today? Would her food choices be more or less than her estimated calorie requirements?

2. James is also 13 years old, but he is male and his level of physical activity is active.
  - a. What are his estimated calorie requirements?
  - b. James ate the following:

## BREAKFAST

Cereal with milk	162 calories
Orange juice	105 calories

## LUNCH

Ham sandwich	275 calories
Fresh fruit	64 calories
Water bottle	0 calories
2 Oatmeal raisin cookies	117 calories

## SNACK

Fruit snacks	104 calories
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## DINNER

Baked chicken	262 calories
Broccoli	24 calories
Fruit punch	179 calories
Diet soft drink	4 calories

How many calories did he consume today? Would his food choices be more or less than his estimated calorie requirements? How does his food choices compare to Bianca's?



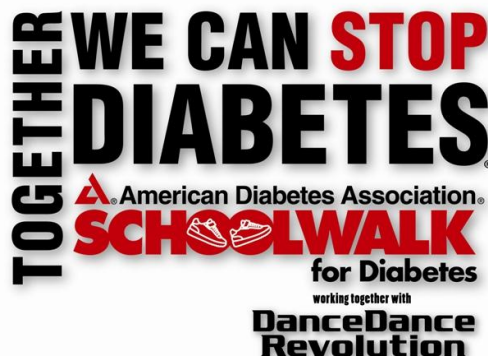
Refer to Chart 2 above to answer the following questions. All situations are based on a 154 pound person.

3. Chad's total daily consumption amounted to 2,000 calories. That same day, he walked for two hours and biked (>10mph) for half an hour.
  - a. How many more calories would he need to burn to keep on his path of losing weight?
  - b. What physical activities would you recommend for him?
4. Beth ate some chicken nuggets (6 piece with ketchup), small french fries, and a soda from a can.
  - a. Go to [www.MyFood-a-pedia.gov](http://www.MyFood-a-pedia.gov) to figure out how many calories she just consumed.
  - b. Beth wants to burn off these calories by exercising. She goes running for an hour and also goes to dance class for an hour. Is she able to accomplish her goal?
  - c. Beth learned in class that it is also important to make healthy choices when eating. Looking at what she ate, what substitutions could you make for a healthier meal?
5. MyPyramid Tracker, is a great tool for assessing your food intake:

**energy input**, verses your physical activity: **energy expenditure**.

- a. Take note of what you eat today. At the end of the day, log this into the Tracker to find out what your daily caloric consumption is.
- b. List down the physical activities and how long you did them for. There will also be a section to add these in.
- c. After you input both your energy in and energy out. MyPyramid Tracker will show your balance of both. Is this where you want to be?

**YOU ARE IN CHARGE!**  
**Live Healthy**



## DIABETES MATH FACT SOLVING WORKSHEET

1. Out of 25.8 million people in the United States that have diabetes, only about 18.8 million know they have it, the remainder who do not know they have it are undiagnosed. How many million do not know they have it?
  - A) 8 million
  - B) 1.5 million
  - C) 7 million
  - D) 12 million
2. One in five health care dollars is currently spent on someone diagnosed with diabetes. How much money would be spent on health care cost due to diabetes from 1,000 health care dollars?
  - A) \$20
  - B) \$40
  - C) \$10
  - D) \$200
3. The Center for Disease Control estimates that 1 out of every 3 children born after the year 2000 will develop diabetes in their lifetime if lifestyles do not change. If there are 30 students in your class, how many students would be at risk for this statistic?
  - A) 20
  - B) 10
  - C) 15
  - D) 8
4. Samara needs 1 unit of insulin for every 15 grams of carbohydrates she eats or drinks. Before eating lunch, Samara found that each serving of chips has 18 grams, chili had 22 grams, an orange has 18 grams, and her soft drink contained 32 grams of carbohydrates. How many units of insulin will she need after eating this meal?
  - A) 4 units
  - B) 5 units
  - C) 6 units
  - D) 7 units

Predicted statistics are based on current trends. Don't be a statistic, YOU ARE IN CHARGE of your health and your future!



# UNDERSTANDING DIABETES

## Type 1

The body does not make any insulin. Your body needs insulin to use sugar (glucose) from the food you eat as fuel for the body's cells. Without insulin, your cells starve and glucose builds up in the blood. Insulin (made in the pancreas) is needed to use the glucose (sugar) from the food we eat as fuel feed it to our body cells for energy

## Type 2

Either the body (pancreas) does not make enough insulin, doesn't use it well, or both.

### TYPE 1

SIGNS/SYMPTOMS	TREATMENT	RISK FACTORS
<ul style="list-style-type: none"> <li>■ Increased Thirst</li> <li>■ Frequent Urination/ Hunger</li> <li>■ Weight Loss</li> <li>■ Tired/Irritable</li> <li>■ Blurred Vision</li> </ul>	<ul style="list-style-type: none"> <li>■ Checking blood sugar levels daily</li> <li>■ Taking multiple, daily insulin injections or wearing an insulin pump</li> <li>■ Counting Carbohydrates and Eating Balanced Meals</li> <li>■ Visiting Physician</li> <li>■ Treating Hypoglycemia (Low blood sugar) and Hyperglycemia (High blood sugar)</li> </ul>	<ul style="list-style-type: none"> <li>■ Family History</li> <li>■ Autoimmune Condition(s)</li> <li>■ Race/ethnicity</li> </ul>

### TYPE 2 (NON-INSULIN DEPENDENT DIABETES)

SIGNS/SYMPTOMS	TREATMENT	RISK FACTORS
<ul style="list-style-type: none"> <li>■ Same as type 1</li> <li>■ Slow-healing sores or frequent infections</li> <li>■ Dark, velvety skin patches in the folds and creases of neck and or armpits</li> </ul>	<ul style="list-style-type: none"> <li>■ Checking blood sugar levels daily</li> <li>■ Meal Planning per physician</li> <li>■ Exercising Regularly per physician</li> <li>■ Medication per physician</li> <li>■ Visiting Physician</li> <li>■ Treating Hypoglycemia (Low blood sugar) and Hyperglycemia (High blood sugar)</li> </ul>	<ul style="list-style-type: none"> <li>■ Family History</li> <li>■ Being Overweight</li> <li>■ Race/ethnicity</li> <li>■ Inactivity and poor eating habits</li> </ul>

## Did You Know...

You can't catch diabetes like a cold

Adults and children can get type 1 or type 2

There is no cure for diabetes but it can be managed

Body type is not always an indicator of the type of diabetes one has

1-888-DIABETES WWW.DIABETES.ORG