



Eating for a Healthy Athlete



Protein:

- The average person requires about 56g of protein for men and 46g for women. That amount is easily provided by 3 glasses of milk and about 2 servings of meat, cheese, or other protein food.
- The average athlete may need between 84g and 119g depending on the type of activity (endurance or power).
- A safe number is **20g to 30g every 4 hours** that you are awake. That is about the amount in a sandwich and a glass of milk.

What about protein powder? Don't I need as much protein as I can get?

The average American diet more than provides the adequate amount of protein for most athletes. Powders may be useful immediately after exercise if no other meals are available.

The body can only take in a **certain amount of protein (~30g) before losing the rest to waste.**

Carbohydrates:

- Carbohydrates are your body's main fuel source.
- Your body stores large amounts of energy in the form of *glycogen* in the muscles and liver to be used in exercise. **Carbohydrates are necessary to replace this energy.**
- Carbohydrates should be taken before and after exercise and during sessions longer than 1 hour.

Hydration:

- Proper hydration is *extremely* important to optimal exercise performance! Dehydration leads to early fatigue.
- **Proper hydration** includes:
 - ~16oz water (2 cups), 2 hours before exercise
 - ~8 - 16oz water (1 -2 cups), 15 – 30 min before exercise
 - Frequent water throughout exercise, especially on hot and humid days.
 - ~4oz every 15 – 30 min.

What about sports drinks?

While it is true that sports drinks can provide electrolytes, they are not generally necessary for most exercise. The average diet generally provides adequate calcium, potassium, sodium and chloride to replace what is lost in exercise. For long, vigorous bouts of exercise in excess of 1 hour, however, these drinks may be advantageous.

Before exercise:

- Meals should be eaten **2 – 4 hours before exercise** for optimal results.
- Breakfast is **extremely** important!!!
 - Exercising without eating breakfast (and skipping meals) leads to **early fatigue**, **low performance** and slows your body's **ability to improve**.
 - Taking in the fuel you need in the morning and throughout the day means your body will have what it needs to **build muscle** and **improve performance**.
- Pre-workout meals and snacks should be well balanced and contain **protein** and **carbohydrates**.
 - A good rule of thumb for meals is:
 - ¼ plate of **Whole Grains**

- ¼ plate of **Lean Protein** (meat, eggs, etc.)
- ½ plate of **Colorful Produce**
- Plenty of **Water**

Pre-exercise meals/snacks include:

- Peanut butter and jelly or peanut butter and banana sandwich
- Greek yogurt with berries
- Oatmeal with low fat milk and fruit
- Apple and peanut butter or almond butter
- Handful of raisins and nuts (3:1 ratio of raisins to nuts)
- Low fat cottage cheese, apple butter, crackers and grapes
- Lean hamburger on whole grain bun with lettuce, tomato, a side salad and yogurt parfait

During Exercise:

- For bouts of exercise **<1 hour**, fueling during exercise is **generally not needed** or beneficial to performance
- For bouts of exercise **>1 hour**, a small amount of carbohydrates **may prevent fatigue**.
 - 15g to 24g of carbohydrate every 30 minutes from easy to digest sources:
 - ½ - 1 cup juice
 - ½ medium banana
 - ~1 oz of most sports gels
 - 1 – 1 ½ cup Gatorade* (**1/2 of a 20 oz bottle**)

***Low calorie sports drinks are mainly made with artificial sweeteners and do not provide carbohydrates**

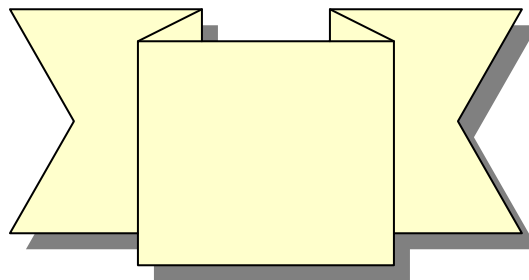


After Exercise:

- Your body needs **both carbohydrates and protein** shortly after exercise to replenish lost energy and promote muscle growth.
 - Eat a small snack/meal within **15 –30 minutes** after exercise
 - Include a **3:1 carbohydrate to protein** ratio
 - **Post exercise** meals/snacks include:
 - Smoothie
 - Low fat chocolate milk
 - Turkey on a whole grain wrap with veggies
 - Yogurt with berries
 - Eat a **regular meal 3 – 4 hours** after exercise

Main points to take away:

- **Don't try anything new** on race or competition days!
- Your body needs **carbohydrates, protein and water** to perform and improve!
- **Always eat breakfast** and soon **after exercise** for optimal improvement and performance!
- Exercise is as much about what you **do beforehand** as it is about what you do **during** it!



Meals to Maximize your Energy on Game Day!

Breakfast

Serve with a glass of water or low fat milk

- **Oatmeal with berries**
- **Omelet with a medium banana**
- **Peanut butter & honey on toast + instant breakfast drink**
- **Oatmeal with brown sugar and almonds + banana**
- **Fruit and yogurt smoothie + low-fat granola**
- **Good School Breakfast choices:**
 - **Breakfast Sandwich with Fruit & Milk**
 - **Breakfast Pizza with Fruit & Milk**
 - **Breakfast Burrito with Fruit & Milk**
 - **Scrambled Eggs with Toast and Potatoes, Fruit & Milk**
 - **PBJ Sandwich with Fruit & Milk**
 - **Yogurt Parfait with Fruit & Milk**



Lunch

*3 to 4 hours before the game
Serve with a glass of water or low fat milk*

- **Low-fat cottage cheese + apple butter + crackers + fresh grapes**
- **Lean hamburger on bun with lettuce & tomato + side salad + yogurt-fruit parfait**
- **Turkey and Swiss sandwich + fruit + sports drink**
- **Low-fat tuna melt sandwich + fruit cup + fat-free yogurt**
- **Baked potato with lean meat + vegetables**
- **Stir-fry with lean meat and vegetables + rice**
- **Spaghetti with red meat sauce + side salad**

- **Good School Lunch choices:**
 - **Sub Sandwich, Deli Wrap, or Entrée Salad with Fruit, Vegetable, & Milk**
 - **Spaghetti with Garlic Toast with Fruit, Vegetable, & Milk**
 - **Pizza with Fruit, Vegetable, & Milk**



*Pasta, fruit, milk, bread and vegetables are all healthy sources of **carbohydrates**. Use them in your lunch before the big game to **maximize** your performance!*

A good rule of thumb for meals is:

- ¼ plate of **Whole Grains**
- ¼ plate of **Lean Protein (meat, eggs, etc.)**
- ½ plate of **Colorful Produce**
- Plenty of **Water** or a **glass of low fat Milk**

30 min Before the Game

Drink 1-2 cups of water 30 – 60 minutes before to stay hydrated.

- **Handful of raisins (save them from lunch) and nuts (3:1 ratio of raisins to nuts)**
- **Piece of fruit (you can save one from lunch)**
- **Jam sandwich**
- **Sports gel, Sport beans, Sports bar**
- **Granola bar**
- **Fruit juice**

Each of these snacks are great sources of a easy to digest carbohydrates.

Always eat within 15 - 30 minutes after

Drink 1 cup of water to ensure hydration.

- **Smoothie made with berries and milk**
- **Low fat chocolate milk**
- **Turkey on a whole grain wrap with veggies**
- **Yogurt with berries**

Eating these carbohydrate and protein rich foods after exercise will help you build more muscle for you next game!

