

## Highlands Performance Volleyball Nutrition: Jennifer Egeland, MS, RND, LD

### Pre Workout Nutrition

**Hydration:** You should be well hydrated (drinking water) before exercise. Being well-hydrated will make your exercise easier and more effective. Try to drink 16-20 ounces of water during the 1-2 hours before starting your workout.

**Your Pre-Exercise Meal or Snack:** Most of the fuel you use during exercise doesn't come from the food you've recently eaten! It actually comes from the carbohydrates (called "glycogen") and fat that's stored in your muscles, liver, and fat cells. That's enough to fuel 1-2 hours of very intense exercise or 3-4 hours of moderate intensity exercise. So the quality of your overall diet is very important to keep your fuel tank full.

### There are two ways to handle getting your pre-exercise nutrition:

As a general rule of thumb, it's best not to eat immediately before a workout because while your muscles are still working while your stomach is trying to simultaneously digest the food in your stomach. These competing demands are a challenge for optimal performance. And, even more of a factor, eating too close to a workout may cause you to experience some GI discomfort while you train or play.

Ideally, you should fuel your body about 1-3 hours pre workout, depending on how your body tolerates food. Experiment and see what time frame works best for your body. If you're a competitive athlete, this is something you need to explore during your training days and not during game day.

1. Eat a small (100- to 200-calorie) snack about 30 minutes before you work out. This snack should include carbohydrates and very little fat, so that you digest the meal quickly and the fuel is available during your exercise session. Here are some ideas:

100% Fruit juice, Fruit smoothie, High-glycemic fruits like pineapple, apricots, banana, mango, and watermelon

Sports drinks (only need sports drinks if you exercise more than an hour)

Pretzels or bagels (but not whole grain varieties, which digest slowly)

Energy bars (look for 3-5 grams of protein, at least 15 grams of carbs, and very little fat)

2. Eat a nutritionally balanced meal 1-3 hours before your exercise. This is the best option for many people. The larger the meal, and the more fat and protein it contains, the longer you may need to wait before exercising. Include carbohydrates, which should keep your blood sugar and energy levels fairly stable during your exercise session. Include some protein to help prevent the breakdown of muscle for fuel and give your muscles a head start on recovery after exercise.

**Don't Skip the Carbs :**Carbohydrates are fuel for your "engine" (i.e., your muscles). The harder your engine is working the more carbs you need to keep going.

**Here are some suggestions for pre workout fuel:**

- A peanut butter and banana or PBJ sandwich
- Greek yogurt with berries
- Oatmeal with low fat milk and fruit
- Apple with peanut or almond butter
- Handful of nuts and raisins (two parts raisins: one part nuts)

Notice that each of the above includes some protein as well as carbs. Carbs are the fuel. Protein is what rebuilds and repairs, but also "primes the pump" to make the right amino acids available for your muscles. Getting protein and carbs into your system is even more vital post workout.

**Take Home Points**

- Your body needs carbs to fuel your working muscles.
- Protein is there to help build and repair muscles.
- Get a combination of the two in your body 1-3 hours pre workout
- Never try ANYTHING new on race or game day—it's always best to experiment during training to learn what works best for your body