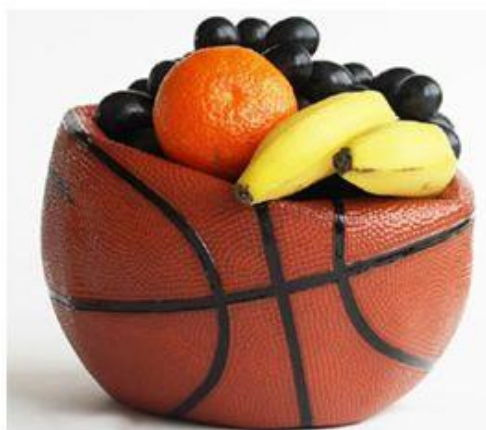


Nutritional Recovery



Proper nutrition is part of an athlete's training that can be easily controlled to help improve performance, however many times nutritional recovery after training sessions and competition is ignored. Nutrition is something that has to be a part of an athlete's training day in and day out, a quick change will not give you the results you desire.



Important Facts:

- The amount of energy exerted must equal the amount of energy taken in through food to maintain an energy balance.
- Primary source of energy comes from carbohydrates.
- Energy intake helps maintain body weight and allows for optimal protein use in the body.
- Fat intake is also important to maintain energy levels.
- Athletes that restrict energy intake are at risk of micronutrient deficiencies.

Benefits of Proper Nutritional Recovery:

- Repairs damage that has been done to muscles and bone during the training session or competition.
- Prevent illness.
- Prevent injury.
- Helps to keep the neurotransmitters in the brain functioning at optimum performance.
- Enhances muscle productivity.



How to Keep your Energy Level:



- 70% of maximal oxygen capacity is derived from carbohydrates and the rest from free fatty acid oxidation. (ACSM Nutrition and Athletic Performance position paper)
- Consume 100-150 grams of carbohydrates in your recovery meal.
- Consume 10 grams of protein in your recovery meal.
- Consume moderately high to high glycemic carbohydrates.

What are High glycemic carbohydrates?

- They are carbohydrates that break down more quickly.
- They are carbohydrates that increase blood glucose more rapidly.
- White bread, bagels, Gatorade etc.



Nutrient Timing:

- The specific time at which you consume certain nutrients.
- Needed before, during, and after training or competition
 - Before: provide sufficient fluid, low in fat and fiber, high in carbohydrates, moderate in protein, be composed of familiar foods.
 - During: must replace fluid loss, provide carbohydrates to maintain glucose levels.
 - After: provide adequate fluids, electrolytes, energy, and carbohydrates to replenish and repair muscle tissue.

Post Workout Recovery Meal Examples

<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
1 slice Wheat Bread	11.88	2.73
1 tbsp. Peanut Butter, smooth	3.13	4.01
1 cup seedless Raisins	114.95	4.45
Totals	129.96	11.19
<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
1 cup Trail Mix, Tropical	91.84	8.82
1 Banana	26.95	1.29
Totals	118.79	10.11
<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
8 oz. low fat, fruit yogurt	43.24	9.92
1 cup frozen blueberries	50.49	0.92
8 oz. apple juice	28.97	0.15
Totals	122.70	10.99
<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
1 cup applesauce canned sweetened	50.77	0.46
1 cup graham crackers(plain, honey, cinn)	64.51	5.80
1 slice regular ham	1.09	4.71
Totals	116.37	10.97
<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
4" cinnamon raisin bagel	49.13	8.72
1 tbsp. butter (optional)	0.01	0.12
1 cup applesauce canned, sweetened	50.77	0.46
1 orange	15.39	1.23
Totals	115.30	10.53
<u>Food Choice</u>	<u>Carbohydrate (grams)</u>	<u>Protein (grams)</u>
1 Kellogg's Nutri-Grain Cereal Bar, fruit filled	26.79	1.63
1 banana	26.95	1.29
10 Pretzels, hard, plain, salted	47.52	6.20
Totals	101.26	9.12