

Eat Right to Play Right

Nutrition for the Soccer Player



PLAYERS!
Competition is stiff!
Give yourself the edge
and
Help yourself to be the very best you can be!

What you put into your body does affect your energy level
Read the great advice and tips below.

With thanks to Health Consultant

Diana McKenzie, RN

Soccer is a fast paced, intense, competitive sport, and the demands on a players' body can be incredible. During a game, a player is in constant motion for 30-45 minutes at one time, depending on age and level of play, followed by a 10 minute break and then another 30-45 minutes of constant activity. The average soccer player can travel up to 12 miles per game at various speeds. This means that a great deal of energy is used and must be replaced.

Okay, now that we have your attention, let's move on to the really important stuff!

Nutrition needs to be a priority of an athlete's training. What you eat daily, weekly, and monthly will affect your energy level, performance and overall health. Energy in means energy out! It is so important that a soccer player eats a well balanced diet high in complex carbohydrates, and low in fats which will help them to maximize their energy levels and perform at their optimal levels.

Proper nutrition not only benefits an athlete physically, but also mentally and that's half the battle on the field. If the brain is not well fed, then the player will not play to the best of their ability. Without the right food, a player can suffer from the inability to concentrate, lethargy (feeling tired all over), having visual problems, muscle cramps, dizziness and even passing out.

Don't forget about dehydration! [A soccer player should start hydrating 2-3 days prior to games and tournaments.](#) Players can lose as much as 3 quarts of fluid in a fast paced game and in hot climates. Fluid replacement is one of the most important nutritional concerns of a soccer player. Body fluids are not only lost through the skin as sweat, but also through the lungs when breathing.

Fluids should be replaced during half time and if possible during the game, especially on hot days, and after the game. The liquid should be at or around normal body temperature, as cold liquids are absorbed slower. Water, along with sports drinks that may or may not be enhanced with electrolytes, is acceptable and should not be gulped as the body will use smaller quantities more easily.

By following a good dietary plan, eating well-balanced meals and staying hydrated, soccer players will discipline their bodies as well as their minds. Performance levels should increase, overall health should improve and preparation will be made for future competitions at higher levels of play.



Below you will find information regarding proper foods and drinks that athletes should or should not be eating or drinking prior to, during and after games. All of this information is only a guide and there are no guarantees. If you have any questions or health concerns, please contact your physician or nutritionist.

The most important thing to remember when developing a proper diet for any athlete is that it must be well balanced. Soccer player's needs energy for performance, therefore the proportion of carbohydrates, fats and proteins they eat is very important.

Let's break it down into the following categories:

1. Carbohydrates, Fats, Proteins, Vitamins, Minerals, and Fluids
2. Sample menus of high carbohydrate/high energy diets
3. Foods and drinks to avoid
4. Pre-game, during the game, and post game meals

1. Carbohydrates are very important and come in two different types:

A. Complex = spaghetti, potatoes, lasagna, unsweetened cereal, rice, baked beans, peas, lentils, sweet corn and other grain products

B. Simple = fruits, milk, honey and sugar

Complex "carbs" should be given priority because they provide 40-50% of our body's energy requirements. Okay, let's get technical...during digestion, our body breaks down carbohydrates into glucose and stores it in our muscles as glycogen. While exercising, glycogen turns back into glucose and is used for energy.

***Soccer players need to eat a high carbohydrate diet 2-3 days prior to an event so that the muscles and liver will store the amount of glycogen needed to sustain enough energy for 90+ minute games.**

Got that....remember....eat your complex carbs!

Fats also provide fuel for the body and may contribute to as much as 75% energy. Keep in mind that trained athletes use fat for energy more quickly than untrained athletes, and the amount of fat used as fuel will depend on the duration of the event and athlete's condition. Remember that fatty foods can slow digestion, so be choosy and avoid eating these foods a few hours before and after exercising. Stay away from fried foods. That means French fries ladies! They will only slow you down and go straight to your hips...trust me.

Protein seems to be a hot topic with athletes due to the "protein supplements" that are widely available today. It is a myth that athletes need huge daily intakes of protein. Yes, exercise may increase the body's need for protein, but a varied diet with a protein intake of 10-12 % of total calories is sufficient. After all, extra protein is just stored as fat and it is training that builds muscle, not protein. Too much protein can do more harm than good. Some good sources of protein are fish, lean meats and poultry, eggs, dairy, nuts, soy and peanut butter.

Vitamins & Minerals are also important, and if an athlete is following a proper diet and eating well balanced meals, then these needs will be met. Female players sometimes need additional iron and calcium. Iron can be found in certain foods such as lean red meats, grains that are fortified with iron, and green leafy vegetables. So eat your salads, broccoli, and veggies!

Calcium, which helps build strong bones and protects against stress fractures can be found in dairy foods such as low-fat milk, yogurt, and cheese. You can also supplement with vitamins...again, always check with your doctor first!

Fluids are just as important as nutrition **and athletes need to start hydrating at least 2-3 days prior to competitions.** Carbonated, high sugar and caffeinated beverages should be avoided. Water is the drink of choice and the player should drink at least 3-4 (8 oz) glasses of water daily along with eating foods high in water content.

Drink Lots of Water

Remember that it's important to hydrate prior to, during and after games. Here are some recommendations for hydrating:

Day before	Water
Pre-event meal	2-3 cups
2 hours before game	2-2 ½ cups
½ hour before game	2 cups

***Frequently throughout the game.**

After each game, players should attempt to ingest enough carbohydrate-containing sports drinks to replace all the fluid they have lost during competition. Hydration should continue for several days because it may take that long to hydrate an athlete's body depending on the level of play, climate, etc.

The following are some suggested foods that are balanced in vitamins, minerals, carbohydrates, and proteins.

Milk & Yogurt	Cantaloupe, Kiwi, Berries
Broccoli	Bananas, raisin, apples
Tomatoes	Oranges, Grapefruit
Chicken, Turkey	Baked potatoes
Spinach	Lean beef
Peppers	Pizza
Tuna Fish & Salmon	Peanut Butter & Nuts
Bran & Whole Grain Cereals	Breads & Whole Grain rolls
Popcorn (air popped)	Peas, beans, lentils

NOTE: Eating sugar or honey before a game does not provide extra energy. In fact, honey will trigger a serotonin- release (serotonin is a natural chemical occurring in the body) which will only make you sleepy. Sugar can cause a surge of insulin which can cause a sharp drop in blood sugar which is definitely not good.

2, HIGH CARBOHYDRATE DIET (SAMPLE)

BREAKFAST	CALORIES	CARBS (grams)
8oz orange juice	120	28
1 cp oatmeal	132	23
1 banana	101	26
8oz low fat milk	102	12
1 piece whole wheat toast	60	12

LUNCH	CALORIES	CARB (grams)
--------------	-----------------	---------------------

2 oz sliced ham	104	0
1 oz Swiss cheese	105	1
1 piece lettuce (green leaf)	120	25
1 slice tomato	1	0
8 oz apple juice	3	1
8 oz skim milk	85	12
2 cookies	96	14

DINNER	CALORIES	CARBS (grams)
---------------	-----------------	----------------------

3 cps Spaghetti	466	97
1 cp tomato sauce w/mushrooms	89+5	20
2 TBSP Parmesan cheese	45	0
4 slices French bread	406	78
1 slice angel food cake	161	36
¼ cp sliced strawberries	13	3
½ cp ice cream	133	16

SNACK	CALORIES	CARBS (grams)
--------------	-----------------	----------------------

16 oz grape juice	330	83
6 fig cookies	386	81

TOTAL (75% of total calories)	3236	613
---	-------------	------------

3. FOODS TO AVOID

High-sugar: Lead to rapid rise and fall in blood sugar which results in less energy. Can draw fluid into the gastrointestinal tract and contribute to dehydration, cramping, nausea and diarrhea (examples =candy bars, desserts, etc.)

Fats: Take longer to digest (examples= bacon, sausage, gravy, sauces, potato chips, tacos, nachos, salami, chocolate, excess butter/margarine)

Carbs Nutrient-poor carbs: Lead to premature use of glycogen stores in endurance events (examples = jam, jelly, white sugar, marshmallows, jelly beans, donuts, etc.)

4. PRE-GAME MEALS & SNACKS

The night before a game, **PASTA is always a good choice** along with:

Salad (very little dressing) Vegetables (fresh, frozen, or steamed)
Rice (steamed or boiled) Cooked dried peas, beans or lentils
Lean Meat Cheese & Crackers
Fish Fresh or dried fruit
Poultry (not fried) Sherbet (1 scoop)
Potatoes (not fried) Pretzels, Popcorn (no butter)

It is recommended that players eat 2-3 hours prior to games and exercising. Studies have shown that when there is food in the stomach, the heart pumps large volumes of blood to the stomach to aid in digestion. When an athlete goes into a game or practice with food in their stomach, the heart will shunt the blood to the working muscles thereby stopping the digestive process. This can cause stomach gas and cramping. Ouch! You don't want this to happen, so stick to your diet and follow these rules!

BREAKFAST

- ✓ Bagels, raisin bran, oatmeal, bran muffin, breads (all varieties), yogurt, toast (2-3 slices) baked beans.
- ✓ Apple, orange, fruit, and vegetable juice; water, milk
- ✓ Fruit bars, Fig Newton's, fruit (fresh or dried), raisins, banana

LUNCH (DURING COMPETITION)

- ✓ Sandwich (2oz lean meat, fish or poultry), cup of stock soup, bagels, (2-3 slices)
- ✓ Apple, orange, fruit, and vegetable juice; water, milk shake, milk
- ✓ Fruit bars, Fig Newton's, fruit (fresh or dried), raisins, banana, apple, cheese and crackers, pretzels, and saltines

POST GAME

- ✓ Pasta, potatoes, vegetables, grains, fruits
DON'T FORGET THE FLUIDS!

REMEMBER: DO EVERYTHING IN MODERATION - DON'T BE EXTREME

References:

Nutrition for the Athlete, by J. Anderson and L. Young (Colorado State University Cooperative Extension foods and nutrition specialist and professor; and L. Young, M.S., former graduate student, food science and human nutrition 12/96

Soccer: Soccer Nutrition and Mental Focus

Other Nutritional Resources:

American Dietetic Association at www.eatright.org

American College of Sports Medicine at www.acsm.org