Nutrition for Healthy Athletes

(Taken from eAYSO nutrition tips 2)

Calories:
Physically active children and adolescents have calorie requirements that are 12-15 percent greater than those of their sedentary peers. The precise calorie and carbohydrate requirements will vary depending on the type, intensity, frequency and duration of exercise in which they engage.

Carbohydrates:
Carbohydrates provide the primary fuel for exercising muscles. It is essential that your athletes consume lots of complex carbohydrates (i.e. whole grains, fruits, and vegetables) on a daily basis. In addition, it is important to ensure that your athletes get the proper amount of carbohydrates before, during, and after exercise to support optimal health and performance.

- **Before Exercise:** Make sure young athletes arrive to practice and games well-fed. They should eat a well0balanced meal that contains 75-200 grams of carbohydrates, 2-4 hours before the practice session or game. A snack 30 minutes prior to exercise may also be beneficial, particularly if an athlete was unable to consume an appropriate meal 2-4 hours prior. The snack should contain approximately 20-50 grams of easily digested carbohydrates. Good snacks include fruit, granola or energy bars.
- **During Exercise:** Consuming carbohydrates during exercise may be beneficial if:
  1. The exercise session is more than one hour.
  2. The exercise session is very intense.
  3. The athlete did not eat anything before exercise.
- **After Exercise:** Replacing carbohydrates that were used during exercise within 2 hours of completing the exercise session is essential for speeding recovery and preparing for the next athletic training period. The post-exercise meal should contain approximately 150-200 grams of carbohydrates.

Keeping Athletes Hydrated

(Taken from eAYSO nutrition tips 2)

A number of factors place young athletes at an increased risk for dehydration and various heat illnesses. First, the higher energy expenditure of young athletes means that they produce more metabolic heat. In addition, young athletes don't sweat as efficiently as older athletes and thus cannot cool their bodies as effectively. Finally, young athletes are not as diligent about drinking fluids and their body core temperature during dehydration tends to increase faster. For these reasons, it is essential that young athletes be encouraged to drink frequently even when they are not thirsty.

Research studies have shown that providing a cooled and flavored beverage produces greater fluid consumption among children and helps prevent dehydration. Parents should make sure that athletes arrive at practice sessions, games or competitions fully hydrated. Coaches should enforce drink "pauses" every 15-20 minutes even when athletes do not feel thirsty. Parents, coaches and the athletes themselves should watch for the "warning signs of dehydration": thirst, irritability, headache, weakness, dizziness, cramps, nausea, decreased performance.

The American college of Sports Medicine (ACSM) provides the following guidelines for the maintenance of optimal hydration:

- **Before Exercise:** 16-20 full ounces within the 2 hour period prior to exercise.
- **During Exercise:** 4-6 full ounces per 20 minutes
- **Post Exercise:** replace 24 full ounces for every pint of body weight lost during exercise.