GSSI

Heat Illness Prevention Tips

The topic of heat illness has received a great deal of attention following the tragic experiences of athletes in hot climates. Heat illness can happen to anyone in a hot environment and is an issue that athletes especially need to be aware of -- **and know how to prevent**.

Athletes increase their risk of heat illness as they become dehydrated. According to the National Athletic Trainers' Association, it is not uncommon to reach dehydration levels significant enough to place athletes at risk of developing exertional heat illness in as little as an hour of exercise. Athletes can reach this level even more rapidly if they begin the workout, practice or competition dehydrated. Many of the risk factors for heat illness can be eliminated to help prevent heat injury to the athlete.

10 Tips to "Beat the Heat"

Recognize the early warning signs of dehydration.

These can include: dark yellow urine, loss of energy, dizziness, loss of coordination, cramps, headaches, or unusual fatigue. If left untreated, more extreme symptoms can occur.

Allow for acclimation.

Acclimation is the body's adaptation to a hot environment. Slowly increase practice intensity and duration over the first two weeks of training. Most cases of heat illness occur in the first 2 to 3 days of training.

Drink up.

Once acclimated, fluid intake needs to be greater because sweat losses will be higher.

Have fluids within arm's reach.

Fluids should be easily accessible during workouts, practices and games.

Don't rely on thirst.

Drink during exercise to minimize losses in body weight but don't over drink.

Favor sports drinks over water.

Research demonstrates that the carbohydrate in sports drinks fuels muscle 2,3,4,5 and sodium encourages voluntary drinking and promotes hydration.1,6,7

Drink it. Don't pour it.

Pouring fluid over your head may feel great but won't help restore body fluids or lower body temperature.

Exercise in the morning or evening.

This is when the weather is coolest. Also, avoid the direct sun to minimize radiant heat from the sun and hot playing surfaces.

Dress for the weather.

Keeping cool in hot weather means wearing fewer clothes and frequently removing gear like helmets during breaks.

Break it up.

Increase the frequency and duration of rest breaks to help you stay hydrated and cool.

If You Feel Like This	***Do This***
Dehydration *Loss of Energy & Performance*	Drinking sports drinks with small amounts of carbohydrate speeds absorption, prevents fatigue and provides energy. Avoid beverages containing caffeine or carbonation.
Muscle Cramps	Stop activity, gently stretch and massage cramped muscles. Consuming a sports drink that contains sodium (at least 110mg/8oz) may reduce the risk of muscle cramps.
Heat Exhaustion *Dizziness, Light-headedness, Chills or Loss of Coordination*	Replace fluids. Rehydration is critical. Rest in a cool, shaded area until all symptoms pass. If dizziness continues, lie with the legs elevated to promote circulation to the head, then seek medical attention.
Nausea/Headaches	Rest in a cool place until nausea passes. Rehydration is critical; drink slowly as nausea passes. Lying down is often helpful in relieving headaches. Do not resume practice if

	any symptoms continue.
Heat Stroke *High Body Temperature*	Immediately cool the athlete by immersion in a tub of ice water and seek immediate medical treatment.
Confusion or Unconsciousness	Confusion or unconsciousness can be indicators of heat stroke. **Heat stroke is a medical emergency that calls for immediate medical assistance.**

The above symptoms of dehydration, heat exhaustion and heat stroke are not additive, which means an athlete could experience heat stroke in the absence of other indicators. These are a few symptoms, some athletes may experience others. **Seek immediate medical assistance at the first signs of serious or unusual symptoms.**

1. Casa, DJ. et al. J. Athl Train 35:212-224, 2000. 2. Below PR et al. Med. Sci. Sports Exerc. 27: 200-210, 1995. 3. Murray R et al. Med. Sci. Sports Exerc. 27: 1057-1062, 1995. 4. Fritzsche, R.G. et al. J. Appl. Physiol. 88: 730-737, 2000. 5. Davis, J.M. et al Int. J. Sport Nutr. Exerc: Metab. 10: 476-485, 2000. 6. Passe, D.H. et al. Appetite 35: 219-229, 2000. 7. Wilk, B. and O. Bar-Or. J. Appl. Physiol. 80:1112-1117, 1996.