Heat Illness

New Law Requiring Training in Heat Illness for all California Coaches Takes Effect January 1, 2019

On June 1, 2018 AB 2800, California High School Coaching Education and Training Program: heat illness, was signed into law by Governor Brown that now will require coaches when renewing their CPR/FIRST AID, Concussion and Sudden Cardiac Arrest (SCA) certification that they also complete training in the signs and symptoms of heat illness. The law takes effect on January 1, 2019.

A FREE online course “Heat Illness Prevention” is available through the CIF and NFHS at https://nfhslearn.com/courses/61140/heat-illness-prevention and will satisfy this mandated requirement by California law.

Heat illness is a preventable tragedy. It is imperative that school leaders ensure, that those adults working directly with our students have the knowledge and ability to minimize risks and reduce injuries for the students they serve.

A proper acclimation plan is essential to minimize the risk of exertional heat illness during the early season practice period. Gradually increasing athletes’ exposure to the duration and intensity of physical activity and to the environment minimizes heat illness risk while improving athletic performance. California has a wide range of environmental factors (beaches, mountains, deserts) that face schools and student-athletes and the acclimation period is vital to minimize the risk.

HEAT ILLNESS

Exercise produces heat within the body and can increase an athlete’s body temperature. Add to this a hot or humid day and any barriers to heat loss such as padding and equipment, and the temperature of the individual can become dangerously high. There are several steps which can be taken to prevent heat illness from occurring:

Adequate Hydration

- The athlete should arrive at practice well-hydrated to reduce the risk of dehydration.
- Water or sports drinks should be readily available to athletes during practice and should be served ideally chilled in containers that allow adequate volumes of fluid to be ingested.
- Water breaks should be given at least every 30-45 minutes and should be long enough to allow athletes to ingest adequate volumes of fluid.
- Athletes should be instructed to continue fluid replacement in between practice sessions.

Gradual Acclimatization

- Intensity and duration of exercise should be gradually increased over a period of 7-14 days to give athletes’ time to build fitness levels and become accustomed to practicing in the heat.
- Protective equipment should be introduced in phases (start with helmet, progress to helmet and shoulder pads, and finally fully uniform).

Hydration Status Record Keeping

- Athletes should weigh-in before and after practice, ideally in dry undergarments in check hydration status.
- The amount of fluid lost should be replaced by the next session of activity. An athlete should drink approximately 16 oz of fluid for each kilogram of fluid lost (1 kg = 2.2 lbs).
- The color of the urine can provide a quick guess at how hydrated the athlete. If the urine is dark like apple juice means the athlete is dehydrated. If the urine is light like lemonade in color means the athlete seems adequately hydrated.

Additional Prevention Measures

- Appropriate medical coverage during exercise.
- The use of lightweight synthetic clothing which aids heat loss.
- Athletes should wear light-colored clothing.
- A well-balanced diet which aids in replacing lost electrolytes.
- Avoid drinks containing stimulants such as ephedrine or high doses of caffeine.
• Alteration of practice plans in extreme environmental conditions.
• Adequate rest breaks in the shade.
• Allow athletes to remove unnecessary equipment during rest breaks.
• Athletes with febrile or gastrointestinal illnesses should not be allowed to participate until recovered.

Resources

FREE COURSE - A Guide to Heat Acclimatization and Heat Illness Prevention
NFHS High School Today: Preventing Heat Illness Must Be No. 1 Priority

Prevention of Heat Illness

CIF Position Statement & Recommendations

NFHS Position on Heat Illness

ID and Treatment of Heat Illness

Parent/Student CIF Heat Illness Information Sheet

Facts About Heat Stress and Athletic Participation

108°: Critical Response - addresses the dangers of heat illness in high school sports. Through personal testimonies from families who have been affected by exertional heat stroke and interviews with coaches, certified athletic trainers, kinesiologists, and other medical professionals, "108°: Critical Response" looks at the seriousness of heat illness and its underlying causes, as well as how to treat and prevent exertional heat illness.