Sports-related Concussion and Head Injury Guidelines

An athlete who is suspected of sustaining a concussion or head injury in an athletic activity shall be immediately removed from the athletic activity..., and shall not be permitted to return to the athletic activity until he or she is evaluated by a licensed health care provider.

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BACKGROUND

Districts shall have procedures and protocols related to athletes suspected of sustaining concussions or head injuries in athletic activities.

California Education Code Section 49475 states:

"(a) If a school district, charter school, or private school elects to offer an athletic program, the school district, charter school, or private school shall comply with both of the following:

(1) An athlete who is suspected of sustaining a concussion or head injury in an athletic activity shall be immediately removed from the athletic activity for the remainder of the day, and shall not be permitted to return to the athletic activity until he or she is evaluated by a licensed health care provider. The athlete shall not be permitted to return to the athletic activity until he or she receives written clearance to return to the athletic activity from a licensed health care provider. If the licensed health care provider determines that the athlete sustained a concussion or a head injury, the athlete shall also complete a graduated return-to-play protocol of no less than seven days in duration under the supervision of a licensed health care provider. The California Interscholastic Federation is urged to work in consultation with the American Academy of Pediatrics and the American Medical Society for Sports Medicine to develop and adopt rules and protocols to implement this paragraph.

(2) On a yearly basis, a concussion and head injury information sheet shall be signed and returned by the athlete and the athlete’s parent or guardian before the athlete initiates practice or competition.

(b) As used in this section, "licensed health care provider" means a licensed health care provider who is trained in the management of concussions and is acting within the scope of his or her practice.

(c) This section does not apply to an athlete engaging in an athletic activity during the regular school day or as part of a physical education course required pursuant to subdivision (d) of Section 51220. (Amended by Stats. 2014, Ch. 165, Sec. 3. Effective January 1, 2015.)"
WHAT IS A CONCUSSION?

A concussion is a traumatic brain injury caused by an impact to the head or body, making the brain move back and forth quickly inside the skull, and must be taken seriously. Concussions can occur without the loss of consciousness in any sport or recreational activity and should receive immediate medical attention. Coaches, parents/guardians, and athletes need to learn the signs and symptoms of concussions and what to do if a concussion occurs. Early recognition and proper management of concussions can help prevent further injury or even death.¹

For more information about concussions, visit the Centers for Disease Control and Prevention’s (CDC’s) web page at https://www.cdc.gov/headsup/. For an informative video about sports concussions, see the American Academy of Neurology’s video at https://www.youtube.com/watch?v=zcEQA3bJk&feature=youtu.be.

WHAT IS CHRONIC TRAUMATIC ENCEPHALOPATHY?

Chronic traumatic encephalopathy (CTE) is thought to result from repeated blows to the head over time, causing progressive damage to nerve cells in the brain. CTE is a result of cumulative trauma to the brain.

WHAT FACTORS IMPACT SPORTS-RELATED CONCUSSION AND CTE RISK?

A significant number of risk factors exist in a sports-related setting for experiencing a concussion or CTE.

- **Type of sport**
  Among commonly played team sports with data available for systematic review, there is strong evidence that concussion risk is greatest in football, rugby, hockey, and soccer.

- **Gender**
  Clear differences in concussion risk between male and female athletes have not been demonstrated for many sports; however, in soccer and basketball there is strong evidence that concussion risk appears to be greater for female athletes.

- **Prior concussion**
  There is strong evidence indicating that a history of concussion/mild traumatic brain injury (mTBI) is a significant risk factor for additional concussions. There is moderate evidence indicating that a recurrent concussion is more likely to occur within 10 days after a prior concussion.
Equipment
There is moderate evidence indicating that use of a helmet (when well fitted, with approved design) effectively reduces, but does not eliminate, risk of concussion and more-serious head trauma in hockey and rugby; similar effectiveness is inferred for football. There is no evidence to support greater efficacy of any particular football helmet, nor of soft head protectors in sports such as soccer or basketball. Furthermore, there is no compelling evidence that mouth guards protect athletes from concussion.

Age or competition level
There is insufficient evidence as to whether or not age or competition level affects athletes’ overall concussion risk.

Position
There are insufficient data as to whether or not team position increases concussion risk.

SIGNS AND SYMPTOMS OF CONCUSSIONS

Signs Observed by Parents/Guardians or Coaches:
- Appears dazed or stunned
- Headache or “pressure” in head
- Is confused about assignment or position
- Nausea or vomiting
- Forgets sports plays
- Balance problems or dizziness
- Is unsure of game, score, or opponent
- Double or blurry vision
- Moves clumsily
- Sensitivity to light

Symptoms Self-reported by Athletes
- Answers questions slowly
- Sensitivity to noise
- Loses consciousness (even briefly)
- Feeling sluggish, hazy, foggy, or groggy
- Shows behavior or personality changes
- Concentration or memory problems
- Can’t recall events prior to hit or fall
- Confusion
- Can’t recall events after hit or fall
- Does not “feel right”

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ACTIONS TO TAKE IF CONCUSSION SUSPECTED

1. **Keep the athlete out of play.**
   The brain needs time to heal. A repeat concussion that occurs before the brain recovers from the first can slow recovery or increase the likelihood of having long-term problems. In rare cases, repeat concussions can result in edema (brain swelling), permanent brain damage, and even death.

2. **Seek medical attention right away.**
   A LHCP will determine if the athlete sustained a concussion and shall provide a written release stating when the athlete is able to return to athletic activity.

3. **Teach athletes, and students, that it is not wise to play with a concussion.**
   Rest is key after a concussion. Sometimes athletes wrongly believe that it shows strength and courage to play injured, but don’t believe “I’m just fine”. Discourage others from pressuring injured athletes to play.

4. **Inform the athletes’ teachers, coaches, and school nurse about ANY concussion.**
   Coaches, teachers, school nurses, and other appropriate school staff should know if the athlete has suffered a concussion; the athlete may need to limit activities during recovery. Activities such as studying, working on a computer, or exercising may cause concussion symptoms to reappear or worsen. Follow the advice of the athlete’s LHCP. If needed, district staff can help adjust the athlete’s school activities during recovery.

CONCUSSION PREVENTION AND RECOVERY

- **Help Prevent Concussions**
  Every sport is different, but there are steps that can be taken to attempt to protect from concussion as follows:

  - Endeavor to ensure that the coach’s rules for safety and the rules of the sport are followed.
  - Encourage athletes to practice good sportsmanship at all times.

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• Confirm athletes are wearing the appropriate protective equipment for the activity (helmets, padding, eye/mouth/shin guards). Protective equipment should fit properly, be well maintained, and be worn consistently and correctly.

• Learn the signs and symptoms of a concussion.

➢ **Help Recovery from a Concussion**

Encourage the athlete to be patient because healing takes time. Only when an athlete has been released to return to athletic activity by a LHCP in writing, should she/he slowly and gradually return to daily activities.

If concussion symptoms return or new symptoms arise as activity increases, then this is a sign that she/he is pushing her/himself too hard. Stop the activities and have the athlete take more time to rest and recover. As time passes, athletes can expect to gradually feel better and eventually resume normal activities.