

# **Sports Medicine**

# CONCUSSION AND HEAD INJURY FACT SHEET FOR COACHES

#### **New Law**

A new law "Student Athletes: Concussions and Head Injuries" (IC 20-34-7) will take effect on July 1, 2012. This law requires that schools distribute information sheets to inform and educate coaches, student athletes, and parents of student athletes concerning the nature and risk of concussion and head injury to student athletes, including the risks of continuing to play after concussion or head injury. The law requires that each year, before beginning practice for an interscholastic or intramural sport, a high school student athlete and the student athlete's parents must be given an information sheet, and both must sign and return a form acknowledging receipt of the information to the student athlete's coach. The law further states that a high school athlete who is suspected of sustaining a concussion or head injury in a practice or game, shall be removed from play at the time of injury and may not return to play until the student athlete has received a written clearance from a licensed health care provider trained in the evaluation and management of concussions and head injuries.

#### **Definition and Statistics**

A concussion is a type of brain injury that changes the way the brain normally works. A concussion is caused by a blow to the head or body that causes the brain to move rapidly inside the skull. As many as 3.8 million sports- and recreation-related concussions occur in the United States each year.

### **Common Causes**

The potential for concussions is greatest in athletic environments where collisions are common, but can occur with any sport. Even a "ding", "getting your bell rung", or what seems to be a mild bump or blow to the head can be serious. Concussions can also result from a fall, or from players colliding with each other or with obstacles, such as goalposts. Examples of situations where a concussion could occur include – a knock to the head from a fall, a jolt to the torso from a collision, a hit to the head from a stick or ball.

# **Signs and Symptoms**

It is important to note that concussions can occur without loss of consciousness. If a student exhibits even one of the following signs or symptoms after a blow or bump to the head, a concussion should be suspected and the student should be removed from play and allowed to return to play only after a written release has been obtained by the licensed health care provider who evaluated the student. The signs of a concussion include that the student: appears dazed or stunned, is confused about assignment or position, forgets sports plays, is unsure of game, score or opponent, moves clumsily, answers questions slowly, loses consciousness (even briefly), shows behavior or personality changes, can't recall events prior



to hit or fall, or can't recall events after hit or fall. The symptoms of a concussion include the following complaints by the student: headache or "pressure" in the head, nausea or vomiting, balance problems or dizziness, double or blurry vision, sensitivity to light, feeling sluggish, hazy, foggy or groggy, concentration or memory problems, confusion or does not "feel right".

## **Danger Signs**

If even one of the following signs or symptoms are observed in a student, it should be considered a medical emergency and 911 should be called: one pupil larger than the other, drowsiness or inability to wake up, a headache that gets worse and does not go away, weakness, numbness, or decreased coordination, repeated vomiting or nausea, slurred speech, convulsions or seizures, inability to recognize people or places, increasing confusion, restlessness, or agitation, unusual behavior, or loss of consciousness (even a brief loss of consciousness should be taken seriously).

### **Treatment**

Since all concussions can be serious, recognition and proper management of concussions when they first occur can help prevent further injury or even death. If you or your staff recognize any (even one) of the above symptoms, the player should be removed from play and assessed by a health care professional (athletic trainer or school nurse) if available. The parents or guardians of the athlete should be informed and the "Heads Up" parent fact sheet should be given. If the student continues to exhibit any (even one) of the signs or symptoms listed above, the athlete must be seen by a licensed health care provider trained in the evaluation and management of concussions and head injuries, and must receive a written clearance from the health care provider who evaluated the student in order to return to play.

Rest is the usual treatment after a concussion or head injury has occurred. The student should return to play based on the treatment plan written by the licensed health care provider. Each student's treatment plan will be individually tailored based on the student's severity of head injury, underlying health condition and ability to resume activities. Typically after a concussion, activity is resumed slowly and gradually increased over time. The timing and speed with which each student returns to normal activity is individual, but follows the progression of beginning with light activity and increasing the activity slowly as the student can tolerate each step without experiencing any signs or symptoms of a concussion. While most athletes with a concussion recover quickly and fully, some will have symptoms that last for days, or even weeks. A more serious concussion can take months before the student is fully recovered.

After a concussion, the brain needs time to rest and heal. That is why it is important that students not resume normal activities, especially athletic competition, too soon. If the student returns before his/her brain is healed, they are at increased risk for a second concussion or a longer recovery due to a reoccurrence of concussion signs and symptoms. A repeat concussion that occurs before the brain recovers from the first – usually within a short time period (hours, days, or weeks) – can slow recovery or increase the chances for long-term problems. In rare cases, repeat concussions can result in edema (brain swelling), permanent brain damage, and even death.



# **Action Plan for a Suspected Concussion**

- 1. Remove the athlete from play.
- 2. Ensure that the athlete is assessed by a health care professional (athletic trainer or school nurse), if available. Do not try to judge the seriousness of the injury yourself.
- 3. Inform the athlete's parents or guardians about the possible concussion and give them the "Heads Up" Concussion in High School Sports A Fact Sheet for Parents.
- 4. Keep the athlete out of play the day of the injury and until a licensed health care provider trained in the evaluation and management of concussions and head injuries signs and returns the Concussion Evaluation and Release to Play Form for Licensed Health Care Providers.

### **List of Forms**

- Packet for Coaches Fact Sheet for Coaches (this sheet), Checklist for Coaches, Quick Reference Guide for Coaches, Q and A Sheet, List of Resources
- "Heads Up" Concussion in High School Sports A Fact Sheet for Parents
- "Heads Up" Concussion in High School Sports A Fact Sheet for Athletes
- Concussion Acknowledgement and Signature Form for Parents and Student Athletes
- Concussion Evaluation and Release to Play Form for Licensed Health Care Providers