

STATE OF VERMONT
DEPARTMENT OF EDUCATION

CONCUSSION GUIDELINES

Sections 39-41 of Act 58 (S.100) of 2011, which is codified in 16 V.S.A. § 1431, direct the Vermont Department of Education (DOE) to develop guidelines to assist schools in taking reasonable steps to prevent, and to minimize the effects of, school athletic team-related concussions. In the creation of these guidelines, the DOE has consulted with the Vermont Department of Health (VDH), and with the Vermont Principals' Association (VPA), and gratefully acknowledges their help.

The law requires that schools educate their coaches, their youth athletes, and the youth athletes' parents and guardians regarding the prevention and mitigation concussion-related injuries. Note that this is now a K-12 requirement, which is an expansion of current practice in many parts of the state.

Under 16 V.S.A. § 1431, responsibility to ensure compliance with these guidelines falls on principals of public schools, and on heads of approved independent schools. Questions have been raised as to where the ultimate responsibility for compliance falls. While 16 V.S.A. § 212(5) vests this responsibility in the Commissioner of Education, 16 V.S.A. § 1431 affords districts significant flexibility in the manner in which they assure attainment of its goals and mandates. For these reasons, these Concussion Guidelines represent only one means of accomplishing the required ends.

The resources and materials which are contained in the Appendices of these Concussion Guidelines are from the U. S. Department of Health and Human Services Center for Disease Control and Prevention (CDC). They have been reviewed by, and are recommended by, the VDH. There are other high-quality resources and materials of a similar nature, and as such, the CDC materials are not the only resources and materials that may be used. Districts are encouraged to review other similar resources and materials, some of which are referenced later in these Concussion Guidelines. For example, similar resources and materials may be found through the National Federation of State High School Associations (NFHS), at www.nfhs.org.

Section 1431 is set forth below, along with the rest of the relevant portions of S.100:

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Sec. 39: FINDINGS

The general assembly finds:

- (1) A concussion is a disturbance to brain function that can range from mild to severe and can disrupt the way the brain normally works.
- (2) A concussion is caused by a blow to or motion of the head or body that causes the brain to move rapidly inside the skull.
- (3) A concussion can occur with or without loss of consciousness, but most concussions occur without loss of consciousness.
- (4) The risks of catastrophic injuries or death are significant when a concussion or other head injury is not properly evaluated and managed.
- (5) Concussions can occur during any organized or unorganized sport or recreational activity and can result from a fall or from a person colliding with one or more other people, with the ground, or with other obstacles.
- (6) The Centers for Disease Control and Prevention estimates that as many as 3,900,000 sports-related and recreation-related concussions occur in the United States each year.
- (7) Concussions are one of the most commonly reported injuries in children and adolescents who participate in athletic and recreational activities.
- (8) Continuing to participate in athletic and recreational activities with a concussion or symptoms of a head injury causes children and adolescents to be vulnerable to greater injury or even death.
- (9) Despite the existence of recognized return-to-play standards for concussions and other head injuries, some children and adolescents in Vermont with a concussion or symptoms of a head injury are prematurely permitted to participate in athletic and recreational activities, resulting in actual or potential physical injury or death.

Sec. 40

16 V.S.A. Chapter 31, Subchapter 3 is added to read:
Subchapter 3: Health and Safety Generally

§ 1431. CONCUSSIONS AND OTHER HEAD INJURIES

- (a) Definitions. For purposes of this subchapter:

(1) “School athletic team” means an interscholastic athletic team or club sponsored by a public or approved independent school for elementary or secondary students;

(2) “Coach” means a person who instructs or trains students on a school athletic team; and

(3) “Youth athlete” means an elementary or secondary student who is a member of a school athletic team;

(b) Guidelines and other information. The commissioner of education or designee, assisted by members of the Vermont Principals’ Association selected by that association, shall develop statewide guidelines, forms, and other materials, and update them when necessary, that are designed to educate coaches, youth athletes, and the parents and guardians of youth athletes regarding:

(1) the nature and risks of concussions and other head injuries;

(2) the risks of premature participation in athletic activities after receiving a concussion or other head injury; and

(3) the importance of obtaining a medical evaluation of a suspected concussion or other head injury and receiving treatment when necessary;

(c) Notice and training. The principal or headmaster of each public and approved independent school in the state, or a designee, shall ensure that:

(1) the information developed pursuant to subsection (b) of this section is provided annually to each youth athlete and the athlete’s parents or guardians;

(2) each youth athlete and a parent or guardian of the athlete annually sign a form acknowledging receipt of the information provided pursuant to subdivision (1) of this subsection and return it to the school prior to the athlete’s participation in training or competition associated with a school athletic team;

(3) (A) each coach of a school athletic team receive training no less frequently than every two years on how to recognize the symptoms of a concussion or other head injury; and

(B) each coach who is new to coaching at the school receive training prior to beginning his or her first coaching assignment for the school; and

(d) Participation in athletic activity. A coach shall not permit a youth athlete to train or compete with a school athletic team if the athlete has been removed or prohibited from participating in a training session or competition associated with the school athletic team due to symptoms of a concussion or other head injury

until the athlete has been examined by and received written permission to participate in athletic activities from a health care provider licensed pursuant to Title 26 and trained in the evaluation and management of concussions and other head injuries.

Sec. 41: EFFECTIVE DATE; IMPLEMENTATION

...

(2) the guidelines, forms, and other materials required by Sec. 40 of this act, 16 V.S.A. § 1431(b), shall be developed and published on the websites of the Vermont Principals' Association and the department of education no later than July 1, 2011; and

(3) the requirements of Sec. 40 of this act, 16 V.S.A. § 1431(c) (notice and training) and (d) (participation), shall be in effect beginning in the autumn 2011 sports season.

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For the purpose of carrying out the mandates of 16 V.S.A. § 1431, it is recommended that schools require their coaches to follow the CDC guidance and training materials regarding concussions. Those resources, which include resources for coaches, student athletes and parents, are available online at: <http://www.cdc.gov/concussion/HeadsUp/youth.html>. In addition, hard copies of those resources are included at the end of these guidelines.

Each new coach should thoroughly review 16 V.S.A. § 1431 and all of the CDC's concussion-related materials prior to the commencement of coaching activities, and all coaches should thoroughly review 16 V.S.A. § 1431 and all of the CDC's concussion-related materials no less frequently than every year, prior to the commencement of coaching activities. It is also recommended that all coaches complete the CDC's online coaches' concussion training which can be found at: http://cdc.gov/concussion/HeadsUp/online_training.html. This on-line training is intended to augment, and not to substitute for, a thorough review of the other coach-focused CDC training materials which are recommended herein and attached hereto.

It is the duty of all coaches to ensure that the student athlete materials and the parent/guardian materials are distributed in accordance with the statute, and that the signed forms that are required by the statute are collected before the student athlete may participate in training or competition.

Copies of the recommended coach, athlete and parent materials are attached to these guidelines, but all coaches, student athletes and parents are encouraged to go to the CDC website and to delve in greater depth into its broad array of resources.

Principals and Heads of School shall ensure that parents receive the concussion-related information required by the statute, that all students receive meaningful age-appropriate exposure to concussion-related information, and that students suspected of having suffered concussions are disqualified from engaging in school-related athletic activity until they have been cleared to return to such activity by a properly qualified individual, with appropriate “return to play protocols” in place. Such return to play protocols may be obtained from Fletcher Allen Health Care (FAHC) and on the VPA website.

The statute is very broad in its definition of who can certify that a student athlete is ready to return to athletic activity, defining it as a “health care provider licensed pursuant to Title 26 and trained in the evaluation and management of concussions and other head injuries.” Since this definition includes a broad array of health care providers, not all of whom are well-suited to making concussion-related return-to-play decisions, the DOE recommends that districts use either a medical doctor licensed under 26 VSA Chapter 23, an osteopathic physician licensed under 26 VSA Chapter 33, an advanced practice registered nurse licensed under 26 VSA Chapter 28, a physician’s assistant licensed under 26 VSA Chapter 31, or a Certified Athletic Trainer (ATC). The DOE further recommends that districts request, accept at face value, and keep on file, proof of the required training, which may constitute a written representation that the medical doctor, osteopathic physician, advanced practice registered nurse or physician’s assistant received the necessary training as a part of his or her initial and/or ongoing medical training.

These Concussion Guidelines are subject to change. Questions or suggestions may be addressed to the VPA, at (802) 229-0547, or to the Legal Division of the DOE, at (802) 828-3136.

How is it diagnosed?

Your health care provider will examine you and obtain a thorough history. If you can't remember what happened, he or she may need to get this information from other people who saw the accident. He/She will do a neurologic examination, testing your strength, sensation, balance, reflexes, and memory. They may also look at your eyes with a flashlight to see if your pupils are the same size. You may be tested again several times during the next hour to detect any worsening of brain function, which can occur if you have any bleeding or swelling in the brain.

X-rays of the brain are rarely needed or useful. Depending on how your head injury occurred, you may have neck x-rays to check your spine.

How is it treated?

The treatment for a concussion is physical AND cognitive rest. That means no physical exertion. Avoid TV, computer work and video games. Extra time may be required for school assignments.

Medications: No medications will speed the recovery process.

- Ibuprofen or Tylenol may help to reduce your headache symptoms.
Ibuprofen: 4 tabs (total 800 mg) every 8 hours as needed for pain.
Or:
Tylenol: 2 tabs (total 650 mg) every 4-5 hrs as needed.
- Your doctor may suggest medication for nausea
- If you take stimulant medications (Adderall, Ritalin, etc), antidepressants, or sleeping aides you should discuss these with your doctor, as they may affect your recovery.

Home Care: If you have had a concussion, you need to be watched by a friend or relative for 8 to 12 hours. It is not necessary to be awakened from sleep after a concussion however it is important to have someone around in the event your symptoms worsen.

Red Flags: Symptoms to report promptly to your health care provider include:

- confusion
- difficulty in rousing from sleep
- seizures
- unequal pupil sizes
- restlessness or irritability
- numbness or trouble using your legs or arms
- worsening vomiting
- headache that will not go away after being treated with Tylenol or Ibuprofen
- garbled speech
- bleeding from the ears or nose
- decreasing alertness
- unusual sleepiness
- unusual behavior
- Increased difficulty balancing

Recovery: If you are stable and recovering during the next 24 hours, you should rest for an additional day or two. As your symptoms go away, you can slowly begin to go back to your usual daily routine. All physical exertion should be avoided until you are cleared by your medical provider. You should stay away from any activities that would risk re-injury. A second concussion before the first one has healed could be very serious and prolong your recovery.

How long will it take me to recover?

- There is no way to accurately predict how long the recovery process will take.
- Recovery usually follows a sequential course but in small number of cases, symptoms may last a long time.
- A few people may have symptoms for 6 months after the injury, but most improve more quickly.

Return to Play

You are only allowed to begin the graduated return to play protocol when you are completely symptom free. During your recovery and when you still have symptoms, you must abide by complete physical and cognitive rest.

It is critically important to be honest with yourself regarding your symptoms as returning too soon may result in a prolonged recovery time. Only you, the athlete, will know when you are feeling ready to increase your activity level.

See Return to Play Plan.

How can I prevent a concussion?

It is very difficult to prevent concussions from occurring. It is important in contact sports that you wear proper protective head gear that fits well. In sports such as football, it is important to use proper blocking and tackling techniques and not to use your head for initial contact. In sports such as bicycling and rollerblading, wear a helmet. Although helmets may not prevent concussions, a well-fitted helmet is critical in preventing other injuries to the face and skull, such as lacerations and fractures.

The health consequences of a concussion may be severe if the symptoms are ignored. It is especially important to understand that receiving a second blow to the head before the first injury is fully healed can be fatal, even if the second injury seems minor.

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Gradual Return to Play Following a Concussive Injury

- This return to play plan should start only when you have been without any symptoms for 24 hours.
- It is important to wait for 24 hours between steps because symptoms may develop several hours after completing a step.
- Do not take any pain medications while moving through this plan (no ibuprofen, aspirin, Aleve, or Tylenol).
- Make a follow up appointment with your provider if symptoms develop during this progression.
- Intensity levels: 1 = very easy; 10 = very hard.

Step 1: Aerobic conditioning - Walking, swimming, or stationary cycling.

- Intensity: 4 out of 10.
- Duration: no more than 30 minutes.
- If symptoms return, wait until you are symptom free for 24 hours then repeat Step 1.
- No symptoms for 24 hours, move to Step 2.

Step 2: Sports specific drills – skating drills in hockey, running drills in soccer/basketball.

- Intensity: 5 or 6 out of 10.
- Duration: no more than 60 minutes.
- No head impact activities. No scrimmages/potential for contact.
- If symptoms return, wait until you are symptom free for 24 hours then repeat Step 1.
- No symptoms for 24 hours, move to Step 3.

Step 3: Non-contact training drills – include more complex training drills (passing in soccer/ice hockey/basketball. Running specific pattern plays, etc).

- No head contact, or potential for body impact.
- OK to begin resistance training.
- Intensity: 7 out of 10.
- Duration: no more than 90 minutes.
- If symptoms return, wait until you are symptom free for 24 hours then repeat Step 2.
- No symptoms for 24 hours, move to Step 4.

Step 4: Full contact practice.

- **Only after medical clearance!**
- No intensity/duration restrictions.
- If symptoms return, wait until you are symptom free for 24 hours and repeat Step 3.
- No symptoms for 24 hours, move to Step 5

Step 5: Full clearance for return to play.