



**KUNG FU WUSHU WA INC.  
CONCUSSION MANAGEMENT POLICY**

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# Concussion Recognition and Management

***Recognising a suspected concussion at the time of injury is extremely important to ensure appropriate management and to prevent further injury.***

## **What is Concussion?**

Concussion is a disturbance in brain function rather than a structural injury to the brain. It is caused by direct or indirect force to the head, face, neck or elsewhere with the force transmitted to the head. An athlete does not have to be knocked unconscious to have a concussion. Loss of consciousness is seen in only 10–15% of cases of concussion. Concussion is difficult to diagnose and only medical doctors can definitively diagnose a concussion. However, recognising a suspected concussion at the time of injury is extremely important to ensure appropriate management and to prevent further injury. Recovery from concussion varies from person to person, and injury to injury. If recognised and appropriately managed most people will recover from their symptoms.

## **Who Gets Concussion?**

Concussions occurs in almost every sport or recreational physical activity. It is more common in sports and activities with full physical contact between players (like the full contact football codes and combat sports like martial arts and boxing) or where players can hit their head forcefully on the ground (for example, snow sports, cycling, horse riding and skateboarding).

## **The Three Most Important Steps of Concussion Management**

- 1. Recognise**  
Recognise an injury has occurred.
- 2. Remove**  
Remove the athlete from the event or activity.
- 3. Refer**  
Refer the athlete to a qualified doctor for assessment. Th

These initial steps should be followed by appropriate rest, recovery, return to school or work, and return to activity.

## **1. Recognising Concussion**

Although a medical practitioner should formally diagnose a concussion, all participants including athletes, parents, coaches, officials, teachers and trainers are responsible for recognising and reporting anyone with visual signs of a head injury or who report concussion symptoms. This is particularly important when a medical practitioner is not at the venue. Watch for when an athlete collides with:

- another athlete;
- a piece of equipment; or
- the ground.

***If an athlete is suspected of sustaining a severe head or spinal injury, call an ambulance immediately to take the player to the nearest emergency department.***

## **Visual Signs**

Athletes who sustain an impact to the head, face, neck, or body can demonstrate visual signs of a concussion such as:

- Lying motionless on the playing surface
- Getting up slowly after a direct or indirect blow to the head
- Being disoriented or unable to respond appropriately to questions
- Having a blank or vacant stare
- Having balance and coordination problems such as stumbling
- or slow laboured movements
- Having a face or head injury

***If any of these signs are present, remove the athlete from the activity immediately. The athlete should not return to activity until assessed by a medical practitioner, even if they seem okay.***

### **Symptoms**

An athlete may report symptoms of a concussion to a team mate, parent, teacher, official or coach. Symptoms that suggest a concussion include:

- Headache
- Feeling “Pressure in the head”
- Balance problems
- Nausea or vomiting
- Drowsiness
- Dizziness
- Blurred vision
- Sensitivity to light
- Sensitivity to noise
- Fatigue or low energy
- “Don’t feel right”
- Feeling more emotional than usual
- Being more irritable than usual
- Sadness
- Being nervous or anxious
- Neck pain
- Difficulty concentrating
- Difficulty remembering
- Feeling slow
- Feeling like “in a fog”

***If any of these symptoms are reported to anyone, remove the player from the activity immediately. The player should not return to activity until assessed by a medical practitioner, even if they feel okay.***

### **Memory Assessment**

If an athlete is more than 12 years old, the questions listed can be used to recognise a suspected concussion. An incorrect answer to any of these questions indicates the player may have sustained a concussion:

- “What venue are we at today?”
- “Which half is it now?”
- “Who scored last in the game?”
- “What team did you play last week/game?”
- “Did your team win the last game?”

Appropriately modified questions can include:

- “What month is it?”
- “What is the date today?”

- “What is the day of the week?”
- “What year is it?”
- “What is the time right now?”

***If the player answers any of these questions incorrectly, remove the athlete from the activity immediately. The athlete should not return to activity until assessed by a medical practitioner, even if they feel or appear okay.***

### **Red Flags**

In some cases, an athlete may have signs or symptoms of a severe head or spinal injury. These should be considered “Red Flags”. If an athlete has any of the “Red Flags” set out in the Concussion Recognition Tool 5, a severe head or spine injury should be suspected. Red Flags include:

- Neck pain or tenderness
- Double vision
- Weakness or tingling/burning in arms or legs
- Severe or increasing headaches
- Seizure or convulsion
- Loss of consciousness
- Deteriorating consciousness
- Vomiting
- Increasing restless, agitation or aggression

### **Practice and Event Day Management**

Clubs and event organisers should develop and implement protocols for managing concussion at practices and on game days.

#### **If a medical practitioner is present at the venue**

If there is a medical practitioner at the venue, they should assess the injured player. If they decide the athlete is concussed, the athlete must not resume participating on the same day, under any circumstances. The athlete must adhere to the return-to-participation protocols.

If the medical practitioner decides the athlete is not concussed, the athlete can resume participating as soon as they feel ready. However, they should be monitored in case any signs or symptoms of concussion develop.

#### **If there is no medical practitioner present at the venue**

If there is not a medical practitioner at the venue, once there has been recognition of signs and symptoms of a potential concussion, the athlete in question should be removed from play immediately and referral of the athlete to a medical practitioner for assessment should take priority. At this time, ensure the athlete is closely monitored and escorted for referral. No one can decide that it is okay for someone with suspected concussion to resume participating on the same day other than a medical practitioner. This includes the athlete themselves, parents of junior athletes, coaches or officials.

## **2. Removal from Play & Immediate Management**

Initial management must adhere to first aid rules, including airway, breathing, circulation and spinal immobilisation. Anyone with a suspected concussion must be removed from the game. This will enable the athlete to be properly assessed. Anyone who has a suspected concussion must not be allowed to return to participation in the same game/day unless cleared by a medical practitioner. Do not be influenced by the athlete, coaching staff, trainers, parents or others suggesting that they should return to play.

Athletes with suspected concussion should:

- Be immediately removed from participation
- Not be left alone initially (at least for the first 1–2 hours)
- Not drink alcohol
- Not use recreational drugs
- Not take certain prescription medications including aspirin, anti-inflammatory medications, sedative medications or strong pain-relieving medications
- Not be sent home by themselves.
- Not drive a motor vehicle
- Be referred for appropriate medical assessment

***An athlete who is removed from an activity because of a suspected concussion must not resume the activity for at least 48 hours, even if there are no signs or symptoms of concussion. An absence of signs or symptoms immediately after an incident is not a reliable indicator, because the signs and symptoms of a concussion may emerge up to 48 hours after the impact.***

### **3. Referral for Medical Assessment**

All athletes with concussion or suspected concussion need a medical assessment by a medical practitioner. If one is not present at an event, the athlete should be referred to a local general practice or hospital emergency department.

***If an athlete is suspected of sustaining a severe head or spinal injury (“Red Flag”), call an ambulance immediately.***

## **Rest, Recovery and Returning to Activity**

### **Concussion in Children and Adolescents**

The management of sport related concussion in children (aged 5 to 12 years) and adolescents (aged 13 to 18 years) requires special paradigms suitable for the developing child. Children have physical and developmental differences - less developed neck muscles; increased head to neck ratio; and brain cells and pathways that are still developing. Children and adolescents may have greater susceptibility to concussion, they may also take longer to recover and they may be at risk of severe consequences such as second impact syndrome. Managing concussion in children and adolescents therefore requires different standards and a more conservative approach. Children typically take longer to recover from concussion than adults (up to four weeks).

### **Return to Learn**

The priority when managing concussion in children should be returning to school and learning, ahead of returning to activity. Concussion symptoms can interfere with memory and information processing. This can make it hard for children to learn in the classroom. Parents should discuss with their doctor and child’s school, an appropriate return-to-school strategy.

### **Concussion in Women**

Research shows that women report more concussions than men when they participate in the same activity with similar rules. Women may also have more symptoms and more severe outcomes than men following a concussion.

### **Concussion in Athletes with Physical Disabilities**

Little research has been conducted in athletes with physical disability, however there is no evidence or theoretical underpinnings to suggest that a physically disabled athlete requires a modified management strategy to an able-bodied athlete of the same age and gender. Therefore, there are no specific recommendations above and beyond the guidelines set up in this policy.

### **Concussion in Athletes with Intellectual Disabilities**

Although, concussion research in athletes with intellectual disability sport classification is virtually non-existent, studies in athletes with a learning disorder have shown that they take longer to recover than athletes without a learning disorder. Therefore, an athlete with an intellectual disability should be managed conservatively.

***If the player is a child, inform the parents of the situation as quickly as possible. Tell them that rest, supervision and appropriate medical assessment is required.***

### **Rest and Recovery**

Most people will recover from a concussion within 10 to 14 days. However, recovery will vary from person to person, and from injury to injury. Children and adolescents often take longer to recover from a concussion than adults, and it is not abnormal for symptoms to last up to 4 weeks or children or adolescents. For children and adolescents, it is suggested the graduated return to play protocol should be extended such that a child does not return to contact/collision activities less than 14 days from the resolution of all symptoms. Rest is recommended immediately following a concussion (24–48 hours). Rest means not undertaking any activity that provokes symptoms. However, anyone who has suffered a concussion should be encouraged to become gradually and progressively more active as long as they do not experience any symptoms.

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### **Returning to Activity**

Managing concussion is a shared responsibility between the athlete, coach, sports trainer, parents and medical practitioner. Open communication is essential and information should be shared. Coaches, administrators and officials should provide athletes and their parents with information about the:

- immediate management of a suspected concussion;
- graduated return-to- participation protocol; and
- medical clearances needed to return to participation.

Always refer the athlete and, if they are a child, their parents, to a qualified medical practitioner with some expertise in the management of concussion. A athlete who has suffered a concussion should return to sport gradually. They should increase their exercise progressively, as long as they remain symptom-free, following the stages outlined below:

### **Following 24–48 hours of physical and mental rest**

<b>Stage</b>	<b>Activity</b>	<b>Goal of Each Stage</b>
Daily activities while remaining symptom-free	Daily activities that do not provoke symptoms	Gradually reintroduce work or school activities.
Light aerobic exercise	Walking, swimming or stationary cycling at a slow to medium pace. No strength or weight training	Increase heart rate
Sport-specific exercise	Running drills in football or skating drills in ice hockey. No activities	Add movement

	with head impact	
Non-contact training drills	Harder training drills, e.g. passing etc. Start progressive strength or weight training.	Exercise, coordination, and mental load
<b>After receiving medical clearance</b>		
Full contact training	Normal training activities	Restore confidence and assess skills by coach
Return to play	Normal game play	

Each stage of the progression should take at least 24 hours. If any symptoms worsen during exercise, the athlete should go back to the previous stage. Strength or weight training should be added only in the later stages (3 or 4 at the earliest). If symptoms persist - more than 10–14 days in adults or more than 4 weeks in children/ adolescents - refer the player to a medical practitioner with expertise in managing concussion.

***Always refer the player and, if they are a child, their parents, to a medical practitioner with some expertise in the management of concussion.***