



## **Herpes Gladiatorum** **Position Statement and Guidelines**

### **National Federation of State High School Associations (NFHS) Sports Medicine Advisory Committee**

In the recent years, control of skin infections has become a crucial part of high school wrestling. Herpes Gladiatorum (HG), caused by Herpes Simplex Type-1 virus (HSV-1), has received the most attention due to the speed of which it can spread and the long term consequences an athlete may have, even after finishing his/her career. The NFHS Sports Medicine Advisory Committee realizes these issues and has helped establish guidelines to educate the sporting and medical community about their presence, means to treat and reduce transmission of this virus.

#### **Guidelines for Herpes Gladiatorum – Treatment and Prevention**

##### **First time Outbreak:**

1. Seek medical attention and oral antiviral treatment to expedite its clearance.
2. Regardless if treated, no wrestling until all lesions are healed with well-adhered scabs. No new vesicle formation and no swollen lymph nodes near area involved.
3. Consider being placed on prophylactic oral antiviral medication for remainder of season and each subsequent season.

##### **Recurrent Outbreaks:**

1. Seek medical attention and oral antiviral treatment to expedite its clearance.
2. No wrestling until after 120 hours of oral antiviral medication and no swollen lymph nodes near area involved.
3. If not treated with antiviral medication, no wrestling until all lesions are healed with well-adhered scabs. No new vesicle formation and no swollen lymph nodes near area involved.
4. Consider being placed on prophylactic oral antiviral medication for remainder of the season and each subsequent season.

Any individual exposed to the outbreak 3 days prior to its development, should be isolated from direct contact with other athletes for 8 days. Examine them daily for potential Herpes Gladiatorum.

Use of antiviral medication for prevention is only at the discretion of your Health Care Provider (HCP), who can then explain the potential risks and benefits.

The spreading of this virus is strictly skin-to-skin with the preponderance of the outbreaks developing on the head, face and neck. This reflects the typical lock-up position a wrestler has facing his/her opponent. Usually a primary outbreak is seen as a raised, rash coalesced into groupings of 6-10 vesicles. Sore throat, fever, swollen, cervical lymph nodes and malaise are typical signs with a first time outbreak. Reoccurrence usually involves a smaller area with less systemic signs and for a shorter duration.

Young athletes who contract Herpes Gladiatorum are destined to have a battle with life-long reoccurrences and potential spread to less suspecting individuals, such as partners or children. Differing from recurrent herpes labialis, or 'cold sores', recurrent Herpes Gladiatorum can develop around the eye. This location has potential for rare but serious consequences with reoccurrences possibly affecting the visual acuity of the afflicted eye.

Previously thought to exist in 2.6% of high school age wrestlers, recent data suggests it may exist in 29.8% of these individuals. Even though this is no different than non-wrestlers in this age group, the location of the outbreaks is of concern. Since only 2-3% of these athletes are aware they have Herpes Gladiatorum, a larger number are competing with the virus and unknowingly exposing it to others. Means of infection control should focus on coaches or Certified Athletic Trainers, performing daily skin checks. An athlete with a suspicious lesion must be withdrawn from practice or competition, only to return after evaluated and cleared by his/her Health Care Provider.

Once an outbreak occurs on a team, removing the athlete from competition or play is mandatory to minimize its spread. After being on antiviral medication, and provided no further signs of infection, he/she can return to play. Since the virus can spread before vesicles are present, it's recommended to examine all athletes in contact with this individual from the previous 3 days. Monitor them for any suspicious lesions, which may take 8 days to develop. Due to the risk of viral spread before vesicle formation, consider isolating these individuals from sparring with others during that time.

The usage of oral antiviral medication is beneficial in expediting the clearance of an outbreak. One paper showed that when used for a recurrent outbreak, these medications showed a 2 day reduction in the length of time it takes to clear the virus. Although controversial, the use of prophylactic dosing can help in reducing the reoccurrence of outbreaks. Data exists showing infected individuals to have a greater preponderance to outbreaks when not on the medication. These medications won't prevent 100% of the outbreaks, but can reduce their occurrence. Amongst health professionals, the concerns about using these medications in this venue center around potential risks, inconsistent benefit and possible resistance development.

Documentation exists stating these issues are minimal, yet plausible and need to be mentioned. Therefore, this determination should be done at the discretion of the parents/guardian, Health Care Provider and the athlete.

The NFHS Sports Medicine Advisory Committee will continue to promote control of Herpes Gladiatorum by education and raising public awareness about the virus. Affected athletes should work closely with their Health Care Providers to determine the best way to treat an outbreak and how to reduce its spread to other wrestlers. The coaching staff and Certified Athletic Trainers shall focus on: daily skin checks, proper hygienic practices, and withdrawal and treatment of individuals with an active outbreak.

*Addendum:* Other considerations could be given to perform blood testing to determine antibodies for HSV-1 at the beginning of each season. Anyone who is positive should be considered for daily antiviral prophylaxis throughout the season, even if they have never had a documented outbreak of Herpes Gladiatorum or cold sores. A belief held by few and supported by recent research in high school wrestlers. There is also data to support that shedding of the virus can occur before actual vesicle formation. This would be of importance since present guidelines focus on the presence of vesicles for withdrawal of competition. Prophylaxis would help prevent vesicle formation and possibly reduce viral shedding as these are very important factors in controlling Herpes Gladiatorum transmission.

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