

Antitox Tet™

Tetanus Antitoxin, Equine Origin

For use in cattle, horses, sheep, and swine as an aid in the prevention and treatment of tetanus caused by *Clostridium tetani*.

- **Dual Purpose** — Antitox Tet is labeled for use as both a preventative and a therapeutic.
- **Multi-Species** — Antitox Tet can be used safely in the following species: Cattle, horses, sheep, and swine.
- **Effective and Reliable** — Antitox Tet has shown proven effectiveness and reliability.

Product Numbers

Antitox Tet™
 290 - 1,500 units
 291 - 10,000 units



Antitox Tet™

DIRECTIONS: Shake well before using. Administer the following doses intramuscularly or subcutaneously.

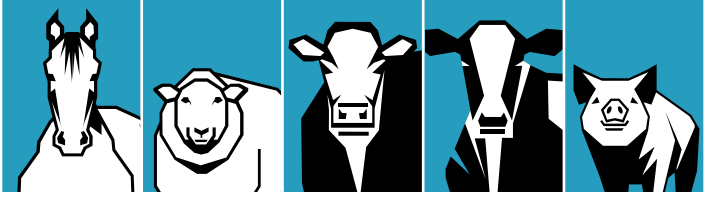
	Prevention	Treatment
Cattle and horses	1,500 units	10,000 - 25,000 units
Sheep and swine	500 units	5,000 - 12,500 units

The maximum volume recommended per injection site is 25mL for cattle or horses and 10mL for sheep or swine.

PRECAUTIONS: Store out of direct sunlight at 2°-7° C (35°-45° F). DO NOT FREEZE. Use entire contents when first opened. Do not administer within 21 days prior to slaughter. For horses the preventative dose may cause injection site reactions. For all species the treatment dose may cause severe injection site reactions and/or systemic reactions. Symptomatic treatment: Epinephrine. Contains gentamicin and thimerosal as preservatives.



Customer Service
(800) 843-3386



Technical disease information

Tetanus is a sporadic disease that affects a wide variety of domestic animals as well as man. The causative agent, *Clostridium tetani*, is an obligate anaerobe, meaning it only grows where there is no oxygen present. The bacteria are present in manure and soil as spores and are highly resistant to destruction. When these spores are carried into a wound, such as a puncture (e.g. castration or docking wound), tissue damage can produce an area devoid of oxygen allowing the spores to begin growing. These growing bacteria produce a potent neurotoxin that travels along nerve tissue to the central nervous system (CNS), resulting in the visible symptoms of tetanus. If large amounts of toxin are produced at the wound site, this toxin can also diffuse in the blood lymph system and be carried to the CNS in this manner. There is also some evidence that preformed toxin can be absorbed through wounds in the mouth when eating toxin-contaminated feeds.

Tetanus usually affects animals less than six months of age because this is the time when procedures such as tail docking and castration are normally performed. Symptoms usually appear after a four-to-ten day incubation period. The first symptoms noticed are erect ears, a stiff tail and prolapsed third eyelids. These progress to generalized muscle spasms and a tightly clenched jaw (hence the name “lockjaw”). All four limbs will be rigid and extended, causing the animal to assume a “saw-horse” stance. The animal is overly sensitive to touch and sound, either of which can precipitate severe spasms. Death is caused by respiratory failure and usually occurs within three to ten days after symptoms appear. The mortality rate approaches 100 percent of affected animals.

In the early stages of the disease, tetanus may be confused with strychnine poisoning, hypomagnesemia, or acute laminitis. Prevention includes removal of any sharp objects that may cause puncture wounds from yards, pastures, and buildings where animals are housed. Use clean techniques when performing surgeries such as castration and tail docking. In addition, **Antitox Tet** should be routinely administered at the prevention dosage anytime animals receive any surgery (e.g. tail docking and castration) that may allow the growth of tetanus organisms. Attempted treatment of tetanus in an affected animal is difficult, which is why prevention is so important. In some cases, a large dose of **Antitox Tet** in conjunction with aggressive therapeutic treatment has been beneficial.

References:

- 1) Kimberling, C.V. Jensen and Swift's Diseases of Sheep. Third Edition, Lea and Febiger. 1988. pp. 114-116.
- 2) Blood, D.D., Radostits, O.M. Veterinary Medicine Seventh Edition. Bailliere - Tindall. 1989. pp. 597-600.
- 3) Howard, J.L., Smith, R.A., Current Veterinary Therapy 4 Food Animal Practice. W.B. Saunders Co. 1999. pp. 383-384.
- 4) Merck Veterinary Manual. Ninth Edition. Merck & Co., Inc. 2005. pp. 495-497.