

Protect against Tetanus

by Dr JH du Preez

Tetanus or lockjaw is a disease that affects almost all animals as well as humans. Horses and humans are the most sensitive victims of the disease, while cattle are less likely to become infected. Young lambs are also frequently affected. Almost all animals that contract tetanus, die.

The toxin of the bacterium that causes Tetanus is very common in faeces, the soil of kraals and in stables. The bacteria can also multiply in the dead tissue of a wound, infecting it. The strong toxin is absorbed from the wound. It then moves along the nerve system to the brain and spinal cord, causing nervous symptoms such as muscle spasms.

The wounds left by castration and docking are the most common areas in which the bacteria multiply. The bacteria may also contaminate and infect the navel. The use of rubber bands for docking is particularly dangerous and must be avoided with lambs not protected against tetanus. These bands cause dead skin, which creates ideal conditions for the bacteria to multiply. Animal and financial losses can be caused through this procedure.

Typical nervous symptoms

- The animal lies down and has great difficulty standing
- It may become so stiff that it falls over and cannot get up again
- The legs are stiffly extended and the whole body is tense
- The neck is drawn back
- The jaw is closed tightly
- When such an animal is disturbed, it may go into an intensive spasm.

Inoculation

Tetanus is best controlled by vaccination. Animals vaccinated for the first time at the age of three months or older, should receive two inoculations at an interval of 4–6 weeks. Thereafter they are inoculated only once a year to maintain immunity.

To protect animals younger than three months during docking or castration and against possible navel infection after birth, the dam should be inoculated at six weeks and again at two weeks before giving birth. After that she needs to be inoculated once every year before the young are born. In this way the young obtain immunity which will protect them for approximately five weeks. At the age of three months they can be inoculated as described before.

Horses can easily contract tetanus. For that reason they need to be vaccinated every year. Other species, particularly sheep, should only be routinely vaccinated where the disease has become a problem on the farm. It is important to apply a high standard of hygiene principles during castration, tail-docking and other surgical procedures. **UM**