

TETANUS

— *Clostridium tetani*

Tetanus is a serious, acute (severe but short-lived), **life threatening condition** that is caused by infection with a bacterium known as *Clostridium tetani*. Tetanus is one of the main causes of death, serious illness and veterinary expense for our baboons undergoing rehabilitation at CARE and it is easily prevented through immunisations.

As the *Clostridium tetani* bacterium is commonly found in the environment, tetanus can never be completely eradicated. In particular, the bacteria are often found in: soil, dust, manure.

The risk can be minimized through immunizations.

The incubation period for a tetanus infection (the time between getting the infection and the onset of symptoms) is 4 to 21 days. The average incubation time is 10 days. A tetanus infection must be treated quickly. The condition cannot be passed from one being to another.

If tetanus is not treated, it can be fatal.

Tetanospasmin Neurotoxin

The tetanus bacteria usually enter the body through a wound or any cut in the skin. Once inside, **the bacteria multiply and release a neurotoxin (poison) called tetanospasmin**, which causes the symptoms of tetanus to develop. The disease affects the nervous system, causing muscle spasms and rigidity.

Tetanospasmin spreads through the bloodstream and affects the nervous system, blocking the nerve signals from the spinal cord to the muscles. This causes **muscle spasms** (involuntary contractions) and **rigidity** (stiffness) throughout the body, particularly in the neck, face and jaw (lockjaw).

Tetanus can eventually lead to respiratory failure, whereby the victim no longer has control over breathing, difficulties with eating, choking, heart attack and in many cases death after painful suffering.

Unable to move...
or feed himself...



Difficulty breathing...
painful muscle spasms...

Death?

This could have
easily been prevented
if his vaccinations
had been sponsored.

**PLEASE SPONSOR A BABOON'S IMMUNIZATION AGAINST TETANUS
TODAY, IT COSTS R768. SAVE A LIFE TODAY!**

TETANUS

Symptoms of tetanus : There are several different types of tetanus.

Generalised tetanus: This is the most common type of tetanus and can be life threatening. A patient may have generalised tetanus for between three and 21 days before there are any symptoms. The symptoms (once they appear) may include:

- jaw muscle spasms or stiffness (lockjaw)
 - muscle stiffness or pain, which usually starts in the neck, shoulders and back
 - spasms or convulsions of the body which may be painful and can affect breathing or digestion
 - fever
 - sweating
- Spasms can last for three to four weeks.

Localised tetanus: In localised tetanus, bacteria only affect the muscles near the wound through which they enter the body. This causes the muscles to go hard and the patient may have painful spasms. Localised tetanus is rare. It can be treated and isn't usually life threatening.

Cephalic tetanus: This is another rare form of tetanus. It affects victims who have had for example a head injury or an ear infection, and the tetanus bacteria enters the body this way. Cephalic tetanus causes the jaw to lock and leads to paralysis rather than spasms. These symptoms come on quickly and can be life threatening.

Neonatal tetanus: This affects newborn babies and can be life threatening. The symptoms are the same as generalised tetanus and occur within a week after birth. Symptoms for the baby: **doesn't feed well, is stiff or rigid, has spasms.**

Complications of tetanus

Tetanus is usually fatal if untreated and even after an expensive series of treatments it still often results in death. The spasms or convulsions may be violent and may cause the victim to stop breathing or have a heart attack. Other complications of tetanus include:

- pneumonia (lung infection) and other infections
- fractures - broken bones due to spasms or convulsions
- breathing problems due to muscle spasms of the diaphragm and larynx
- coma
- malnutrition or choking due to inability to eat or swallow
- heart attack.

Prevention of tetanus

At CARE there is a **immunization programme** in place to prevent tetanus and it is dependent on generous **sponsors**. However, due to the daily running costs of food and other rising bills, **CARE does not have the funding to provide each baboon with a vaccination**. Humans and baboons need five separate injections to be fully protected for life. In humans and our baboons, the first three doses are usually given to babies when they are two, three and four months old. Human children receive a booster when they are about three, and another one around 10 years later. In baboons we aim to give our incoming orphans the vaccinations within the same time frame, one each month for three months and then one a year later. This was not protocol until recently, as CARE is the first sanctuary of its kind, we are learning as we go along. We now have lots of catching up to do with our older troops. For our older troops we must dart the individual with the vaccine once a month for three months and then again a year later, **the darts are very expensive and each adult individual cost R1088 to vaccinate (\$100)**. Even if a human or baboon has had tetanus once, they can get it again and need to be immunized.

Costs to immunize

Per adult individual the immunizations cost R1088 (covering the costs of four darts and the vaccine). So far the darting has gone exceptionally well and does not seem to cause much stress. Per orphan baby baboon each shot costs R72 and can easily be given as a hand injection. Please become a sponsor and protect a baboon today.

How to become a sponsor;

- **Donate on the Website**
- **Donate directy**
- **Or through a bank transfer** our details are;
- **Or Credit Card** Payments can be paid through the CARE website; www.primatecare.org.za

Its essential to please **email us** to let us know you have made a payment & who you wish to sponsor (email headings FAO Stephen Munro, Tetavax Sponsorship), we can then ensure **tetavax funds can be kept separate** from funding for food and bills.

Send Us an email if you have any questions: info@primatecare.org.za.

Authors of this document:

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Bank transfer to:

Bank: First National Bank (might show as First Rand Johannesburg)

Account name: C.A.R.E. Account no. 6202 5834 187

Branch: Phalaborwa Branch code: 270-452

Address: FNB, 15 Wilger Ave, Phalaborwa, 1390,

South Africa SWIFT No: FIRN ZA JJ XXX

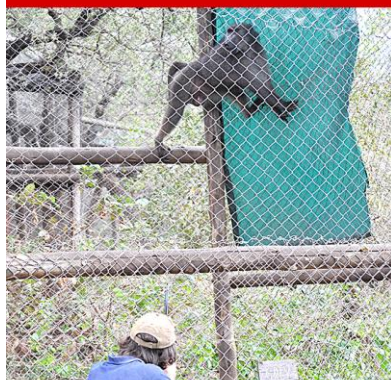
CARE Address: CARE, Plot 5 Grietjie Nature Reserve, Grietjie, Phalaborwa, 1390, SA



4 Darts



Save a Life



Save a Life



Please...