

Animal disease threats and priorities in the GLTFCA -
 A JMB Conservation & Veterinary perspective on a 'real world' relationships between management/policy decisions and research

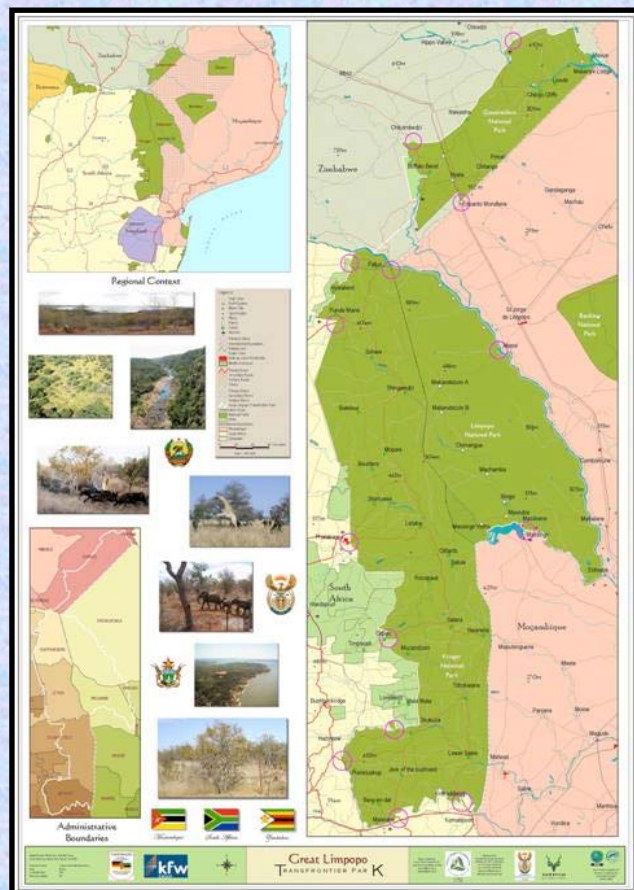
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GLTFCA JMB Veterinary Subcommittee

This committee's mandate includes :

- The identification of potential animal health issues and challenges related to expansion of the geographic range of wildlife and their pathogens.
- Identification of potential conservation threats related to pathogens cycling in neighbouring livestock (in all 3 countries)
- Identification of the related human health and zoonotic issues.
- Inclusion of these veterinary issues in the development of a Joint Management Plan for the GLTP.
- To advise the Joint Management Board (JMB) on the management of animal health challenges, and prioritise appropriate activity areas to address these issues.



**TFCA SUMMARY DOCUMENT FROM THE VETERINARY SUB-COMMITTEE
PRIORITISATION OF ANIMAL HEALTH CHALLENGES IN THE GREAT LIMPOPO
TRANSFRONTIER PARK**

A) INFRASTRUCTURAL NEEDS

- Centralised data base with GIS capability and data management system
- Communication network
 - Technical equipment
 - Diagnostic capability
 - Training and capacity building
 - Eastern Fence of the Limpopo National Park
 - Development of a Wildlife Veterinary Unit in Mozambique

B) DISEASE SURVEILLANCE AND MONITORING

1) Bovine Tuberculosis (BTB) and Brucellosis

- Monitor of BTB and brucella status of cattle in the Sengwe corridor.
- Monitor of BTB and brucella status of cattle in the Limpopo National Park
- Monitor of BTB and brucella status of cattle on the KNP western boundary
- Monitor the TB dynamics of the KNP buffalo herds.
- Buffalo translocations into Limpopo National Park

In the above surveys, funds must also be budgeted for compensation for positive animals that may be slaughtered. Some test-positive animals must be slaughtered to confirm the diagnosis and for TB strain fingerprinting.

2) Tsetse flies and Nagana

- Monitoring of tsetse fly activity and spatio/ temporal spread in Gonarezhou National Park.
- Monitor the northern KNP and LNP for tsetse fly incursion.

3) Anthrax and Rabies surveillance and monitoring

- Report acute death situations in herbivores (wild and domestic)
- Collection of blood smears (with field data sheet)
- Reporting of animals with abnormal behaviour (wild and domestic)

4) Topotyping of foot & mouth disease viruses in buffalo in Gonarezhou and Limpopo National Park.

- Collect blood and probang samples from a significant number of buffalo in Gonarezhou and Limpopo National Park

5) Foreign animal disease surveillance in wildlife

e.g. Rinderpest, Canine distemper, High Path Avian Influenza

6) Surveillance for wildlife-related diseases in livestock

e.g. Foot and mouth disease, Theileriosis, African swine fever, Trypanosomiasis and malignant catarrhal fever

C) Primary Animal Health Care at the interface

- Vaccination of cattle against FMD and anthrax
- Vaccination of dogs against rabies and canine distemper
- Deworming of dogs (including echinococcus)
- Regular dipping and inspection of cattle

INDIGENOUS AFRICAN DISEASES THAT ARE “SILENT” IN THEIR TRADITIONAL HOSTS

- FOOT & MOUTH DISEASE IN BUFFALO
- AFRICAN SWINE FEVER IN WILD PORCINES
- AFRICAN HORSESICKNESS IN ZEBRAS
- THEILERIOSIS IN BUFFALO
- MALIGNANT CATARRHAL FEVER IN WILDEBEEST

INDIGENOUS MULTI- SPECIES DISEASES THAT ARE INHERENTLY FATAL

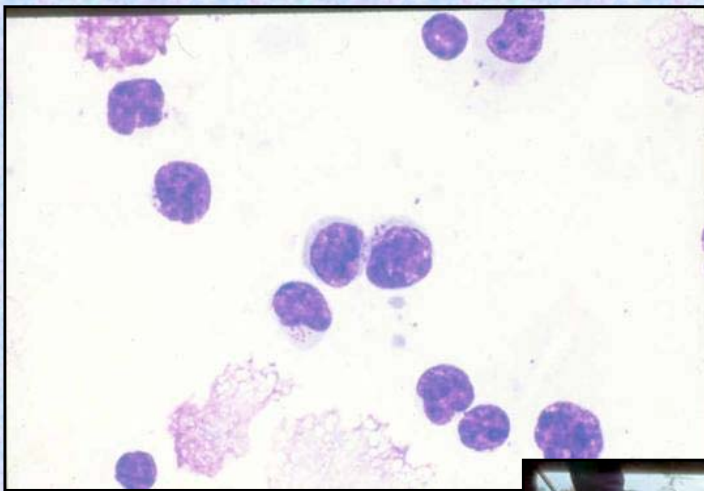
- ANTHRAX
- RABIES

FOREIGN ANIMAL DISEASES

- RINDERPEST
- BOVINE TUBERCULOSIS
- CANINE DISTEMPER
- AVIAN INFLUENZA
- CLASSICAL SWINE FEVER

FMD - THE EPIDEMIC CYCLE





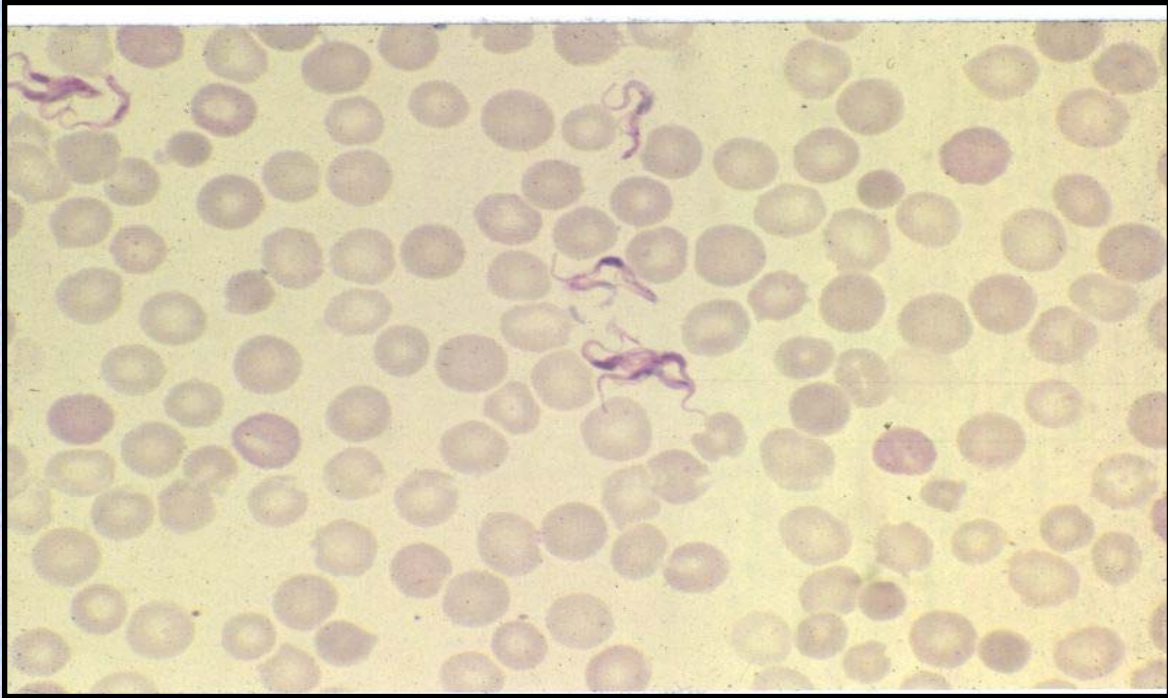
Corridor disease:



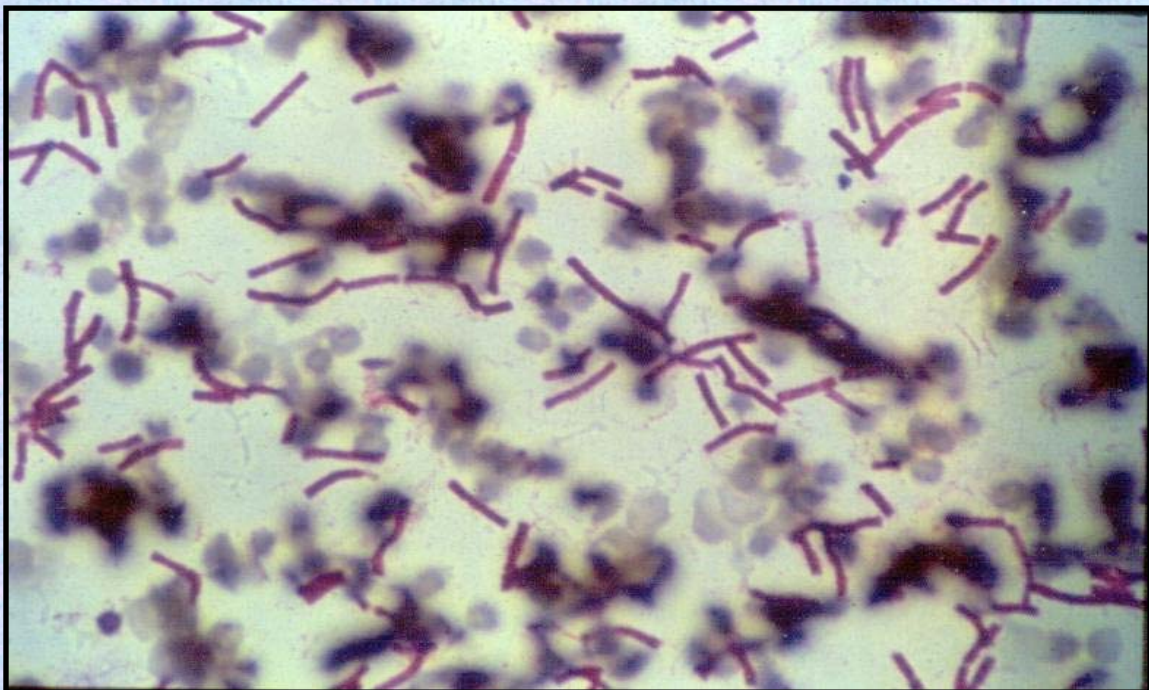
*Rhipicephalus
appendiculatus*

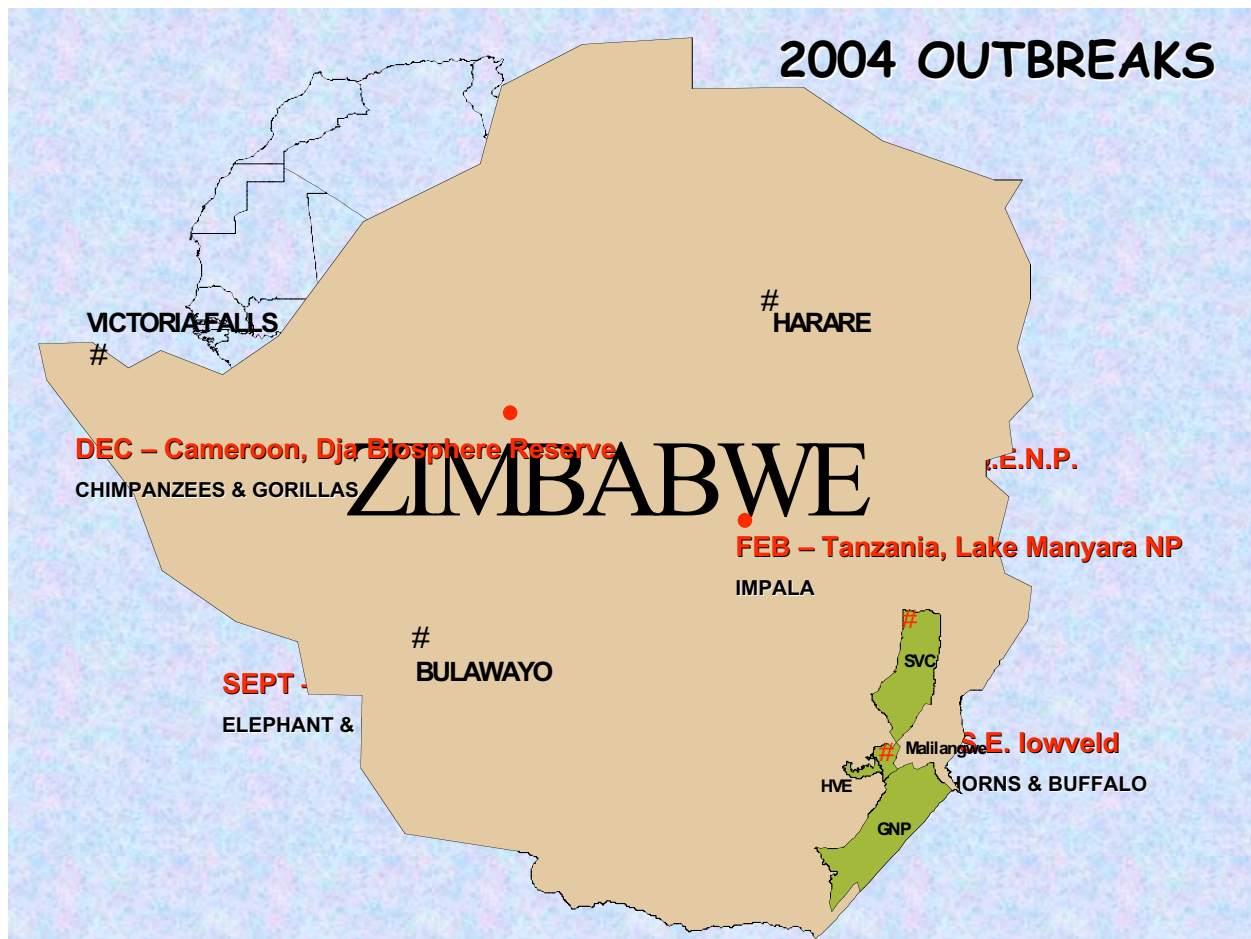


TRYPANOSOMOSIS



ANTHRAX

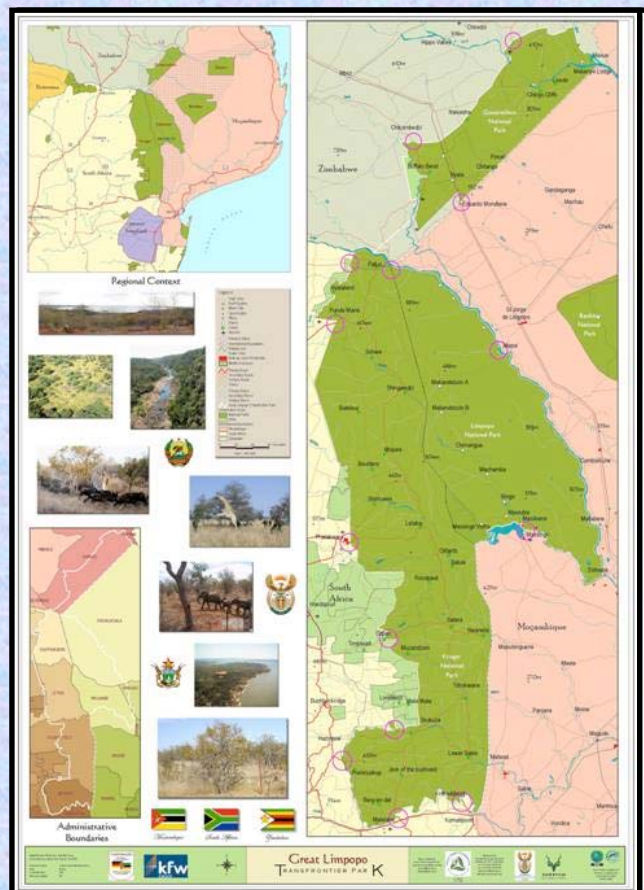


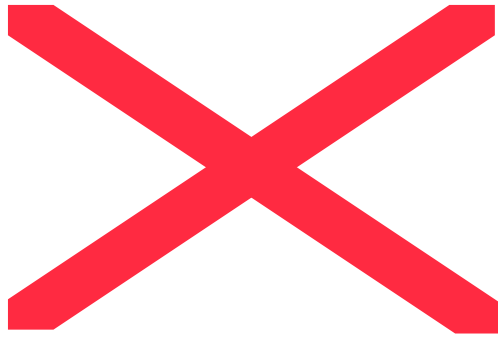


Bovine Tuberculosis

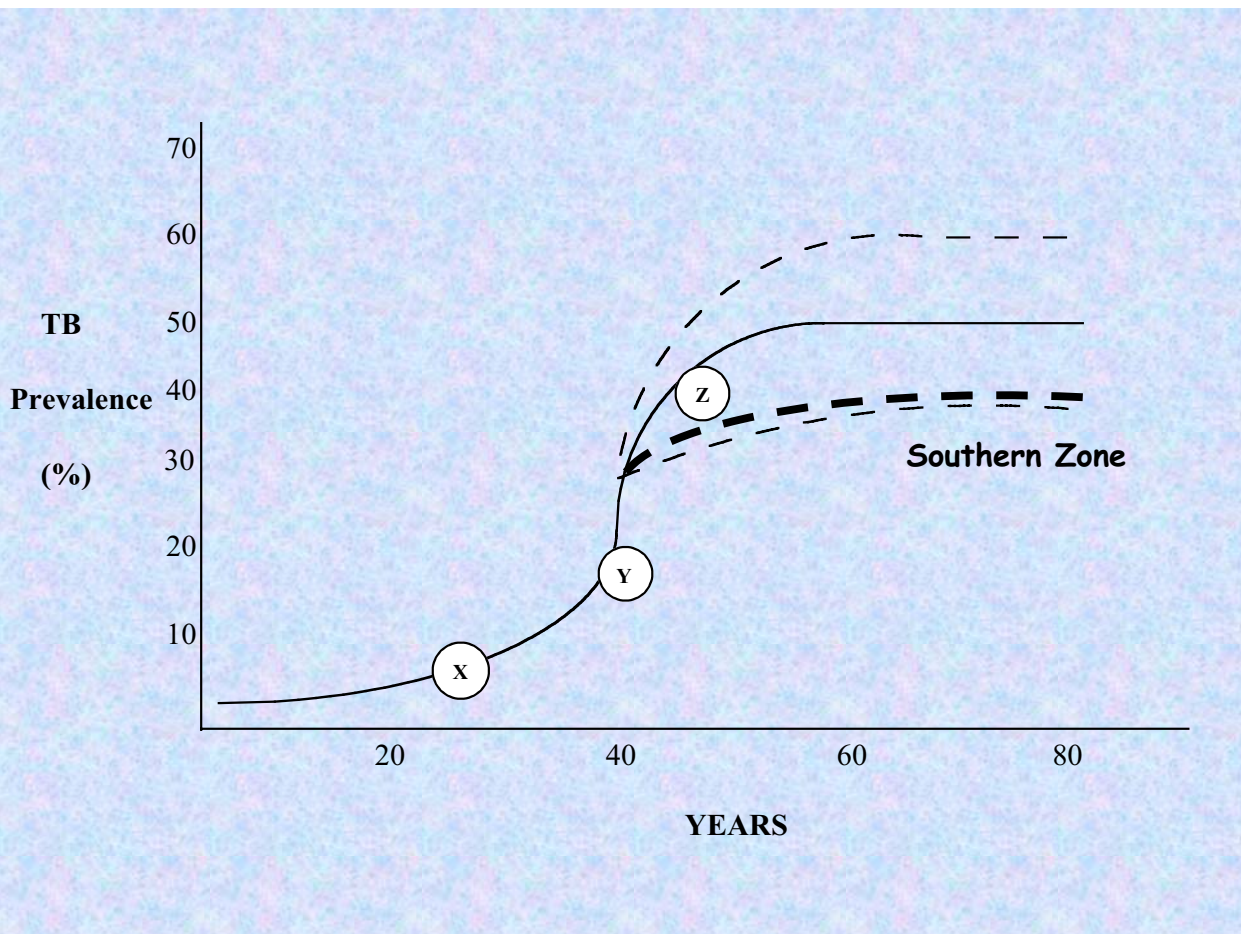


- In August 2005 a buffalo positive for TB was autopsied 6 km from northern border
- Implications for the formation of Transfrontier Conservation area
- Non-lethal survey planned for 2006 in the northern zone, focusing on herds along





Interface issues!?



BOVINE TUBERCULOSIS IN LIONS



RABIES



BRUCELLOSIS



Avian Influenza

Classical Swine Fever

And others?

