Foot and Mouth Disease outbreak and surveillance update report

30 April 2022*



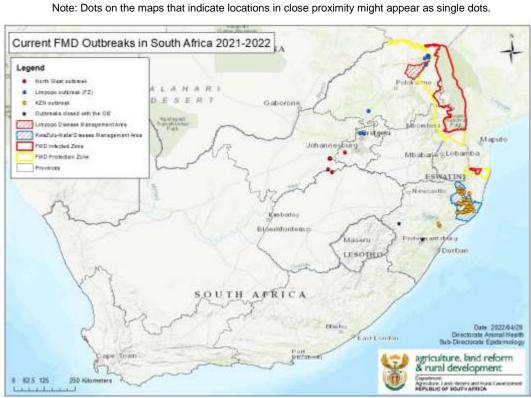
Report compiled by:

Directorate: Animal Health

^{*} This report includes all information as available by close of business on the indicated date. All the updates contained in this report may not currently reflect on the OIE WAHIS system due to technical difficulties with the OIE reporting system. This report reflects changes since the previous update report of 8 April 2022.

1. Introduction and summary

South Africa currently has 57 active Foot and Mouth Disease (FMD) outbreaks in the previous FMD free zone, comprised of three outbreak events. The first event started in May 2021 and is affecting KwaZulu Natal province. The second outbreak event started in March 2022 in the previous free zone in Limpopo Province and has spread to northern Gauteng Province in April 2022. The third outbreak event also started in March 2022 in North West province, with spread to Gauteng and Free State Provinces.



Map 1: Reported outbreaks in the previous FMD free zone 2021 - 2022

Summary of active outbreaks per province:

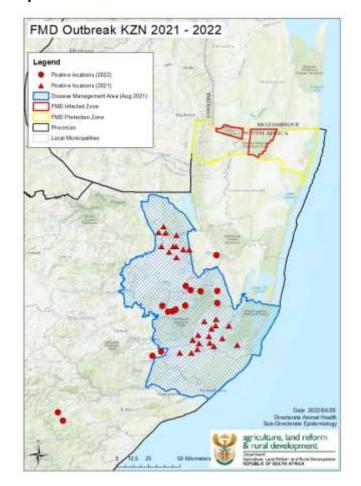
Province	Number of open outbreaks	Number of resolved outbreaks	Total number of outbreaks	Last reported outbreak
KwaZulu Natal	42	2	44	7 April 2022
Limpopo (previous free zone)	6	0	6	7 April 2022
North West	5	0	5	7 April 2022
Gauteng	3	0	3	26 April 2022
Free State	1	0	1	7 April 2022
Total	57	2	59	

2. <u>Details of open outbreaks</u>

2.1 Outbreak event 1: KwaZulu Natal Province

2.1.1 Affected locations

Since the update report of 8 April 2022, no additional cases have been identified in KZN.



Map 2: Outbreak event in KwaZulu Natal Province

2.1.2 Increasing the size of the KZN Disease Management Area:

The Minister of Agriculture, Land Reform and Rural Development declared a Disease Management Area in the KwaZulu-Natal Province (KZN DMA) in the Government Gazette No. 44783 on 30 June 2021, which was reduced in size on 7 September 2021, as declared in the Government Gazette No. 45109. Following the resurgence of the outbreaks in January 2022, and subsequent spread of the disease beyond the margins of the KZN DMA, the margins of the KZN DMA have been reconstructed to include all areas with positive locations or perceived to be at high risk of infection due to being epidemiologically linked.

2.1.3 Movement control

The newly identified infected locations outside the DMA were placed under quarantine and movement control measures also remain in place in the DMA. There has been no change in the movement restrictions on cloven-hoofed animals, their products and genetic material out of, into, within or through the revised DMA. Roadblocks and Visible Veterinary Patrols continue to monitor movements of animals within, through and out of the DMA.

2.1.4 Vaccination

The vaccination campaign is still ongoing in the areas where there appears to be active virus circulation. A risk-based approach is followed, to ensure that the areas at highest risk are vaccinated first. Around 70 000 cattle were vaccinated thus far and the vaccination campaign continues.

2.2 Outbreak event 2: Limpopo-Gauteng Provinces

2.2.1 Affected locations:

Since the update report of 8 April 2022, no additional positive locations were identified in the previous free zone of Limpopo province.

In early April 2022, animals with F-brands were found at auctions in the city of Tshwane municipality, Gauteng, as well as Modimolle, Limpopo. Investigations were conducted and these were identified as illegal movements. The animals have been destroyed and disposed of and the auction premises has been disinfected. In Gauteng, samples were collected from animals on a linked property.

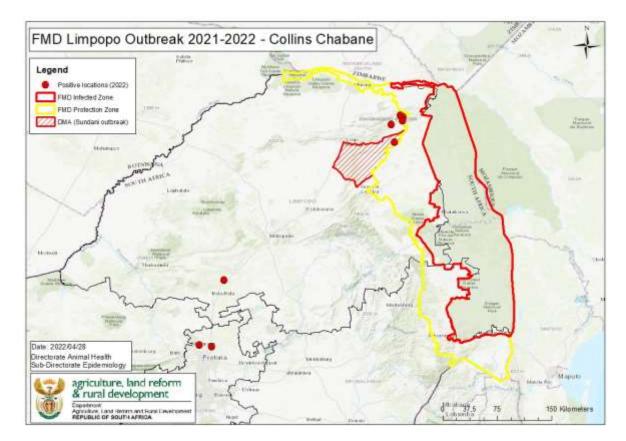
One additional case has been identified in Walmansthal, Gauteng. The farm is in a communal set-up and it is suspected that some of the positive reactors may be due to vaccination.

2.2.2 Movement control:

The affected dip tanks in Limpopo, and the farm in Gauteng, remain under quarantine.

2.2.3 Vaccination:

In an effort to curtail the spread of the disease, cattle in Thulamela, Limpopo are being vaccinated to establish a band of resistant animals around the known positive dip tanks.



Map 3: Outbreak event in Limpopo and Gauteng Province

2.3 Outbreak event 3: North West Province-Gauteng-Free State

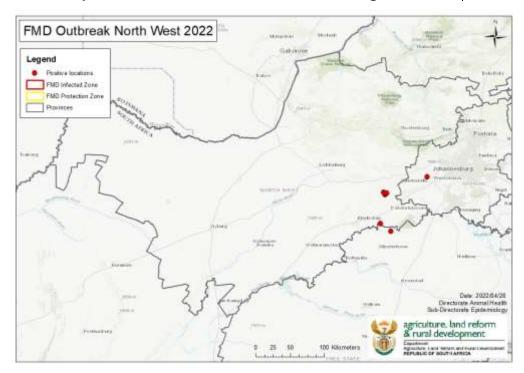
2.3.1 Affected locations:

Since the update report of 8 April 2022, no additional infected farms were identified in North West Province.

Two farms which tested positive, one in Gauteng in the Randfontein municipality and the other in the Free State in the Moqhaka municipality, were identified as epidemiologically linked due to cattle bought at the same auction in the North West Province. These animals have been vaccinated to reduce viral load and are set to be slaughtered at a designated abattoir in Limpopo province.

2.3.2 Control measures implemented:

The affected farms are currently under quarantine with strict access control. The locations involved are well fenced and movement of animals from these farms can be effectively prevented.



Map 4: Outbreak event North West - Gauteng - Free State

3. Diagnostic tests and epidemiology

The outbreak event in Vhembe district in Limpopo Province is caused by a SAT 3 virus, which is also responsible for the outbreaks in North West, Free State and Gauteng Provinces. This virus is not epidemiologically linked to viruses identified in recent years.

In KwaZulu Natal Province, epidemiological investigations to date have not revealed a plausible source for the outbreak. However, the virus responsible for the outbreak is a SAT 2 serotype and is closely related to a SAT 2 virus responsible for an outbreak that occurred in the Protection Zone in northern Limpopo Province in 2019. It is therefore most likely that illegal movement of animals from the Protection Zone in Limpopo, to KZN Province, may be the cause of the outbreak in KZN.

For all reported outbreaks, confirmation of disease was done using a combination of the following diagnostic tests at the ARC Onderstepoort Veterinary Research Transboundary Animal Diseases laboratory (OVR-TAD):

- Solid Phase Competition ELISA (SPCE)
- Non Structural Protein (NSP) ELISA
- Polymerase Chain Reaction (PCR)

4. Surveillance

The affected areas continue to undergo clinical and serological surveillance, with intensified

inspections around newly identified infected dip tanks in communal area, or epidemiologically

linked locations identified through forward and backward tracing. Some locations were

identified as a result of reports of clinical signs seen in cattle, while most were identified during

trace back and trace forward exercises, including links of movements through auctions, as

well as surveillance of farms adjacent to positive locations.

All alerts reported for animals with clinical signs are being followed up. Varied clinical signs

are seen, with some locations showing almost no clinical signs, some showing only foot

lesions, while others show pronounced mouth lesions. The varying clinical presentation of the

disease in different locations necessitates surveillance based on both clinical inspections,

including mouthing, as well as serology.

5. Awareness and Movement

A follow-up media release alerted all farmers, livestock owners and members of industry that

the disease had spread to different provinces due to movement of animals. All stakeholders

were again requested to abide by the movement restrictions within all affected provinces and

to not to move cloven hoofed animals without proper knowledge of the health status of the

farms of origin.

A number of outbreaks were linked to the illegal movement of animals from the FMD infected

zone or protection zone with vaccination to the FMD free zone. Any such animals found are

seized and destroyed and perpetrators are prosecuted for contravention of the Animal

Diseases Act, 1984 (Act No 35 of 1985). A meeting was held with a large group of concerned

stakeholders to further strengthen the liaison and cooperation between veterinary services

and industry.

Director Animal Health

Date: