

# PROTECT LIVESTOCK AND HUMANS: UNDERSTANDING MYCOTOXINS

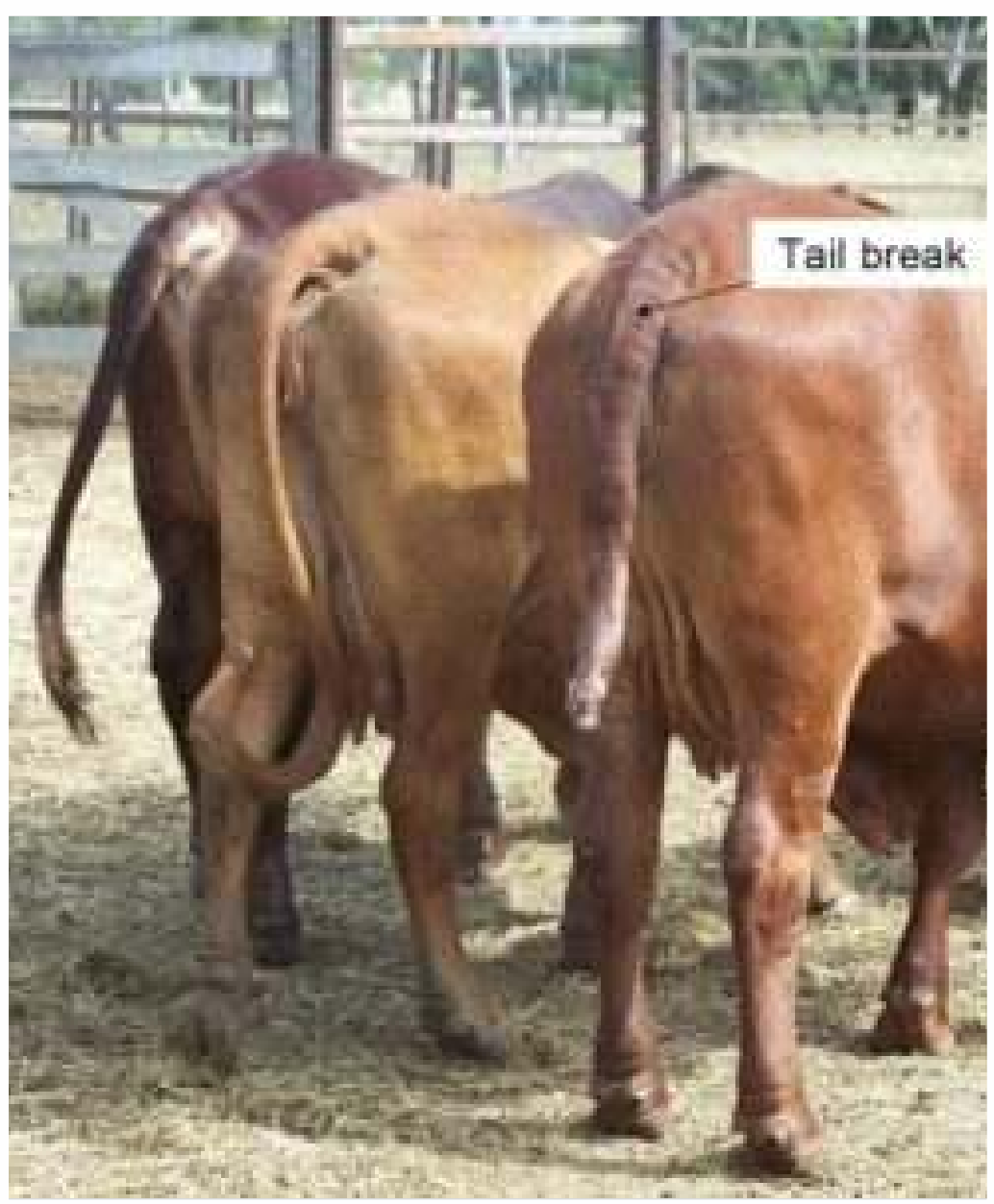


Disease in bovines is caused by toxins produced by mold (fungus) that grows on feed (eg. Ground nut, Maize etc) and stored fodder (paddy straw etc) that is damp. Mainly result in Aflatoxicosis (*Aspergillus flavus* and *A. parasiticus*) and Degnala disease (*Fusarium* spp.).

May cause major health issues including fatalities and **milk production may drop up to 15%.**

## Common Symptoms

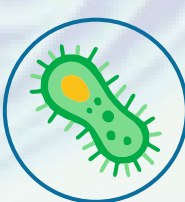
- ❖ Gradual loss of appetite and body condition, intermittent diarrhoea may be seen
- ❖ Alopecia, sloughing of extremities like tail and ear
- ❖ Gangrenous lesions on foot
- ❖ High producers may show symptoms first
- ❖ Reduction in feed consumption, increased occurrence of ketosis
- ❖ Retention of Placenta, fertility issues, abortions, weight loss



*Gangrenous foot lesions and tail necrosis due to mycotoxins.*

## Aflatoxicosis

### Impact



Aflatoxins produced by *Aspergillus* fungi, thriving in warm, humid climates



Found in dairy feeds, grains, and food products.



Types of Aflatoxins:  
- B1, B2, G1, G2 (B1 most toxic)  
- M1 (found in milk)



Impact on Dairy Animals



Low-level exposure:  
No visible symptoms.



Chronic exposure: Feed refusal, Weight loss, Impaired reproduction, Weakened immunity



### Control Measures

#### Use Mycotoxin Binders

Mineral clays and herbal inhibitors neutralize toxins effectively.

- Avoid feeding dry fodder that is or has been damp and is obviously moldy and also avoid feeding feed ingredients with fungus.
- Provide adequate mineral mixture supplements and green fodder.
- Consult a veterinarian immediately on observing any of the above symptoms.

#### During Feed Manufacturing

- Clean raw materials thoroughly.
- Add mycotoxin binders to feed.



*Mold growth on cattle feed stuffs*



*Mold growth on paddy straw*



*Mold growth on Silage*