



Member- Sri Lanka

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Bovine tuberculosis situation in Sri Lanka

Current disease situation

Bovine tuberculosis has been reported and confirmed in cattle in Sri Lanka since 2012 as reported by Department of Animal Production and Health.

How ever a limited number of research have bee done in Sri Lanka on the status, spread and control of the disease both in human and animal populations.

During the last few years there had been several deaths of cattle due to tuberculosis in few farms in Central Province of Sri Lanka.

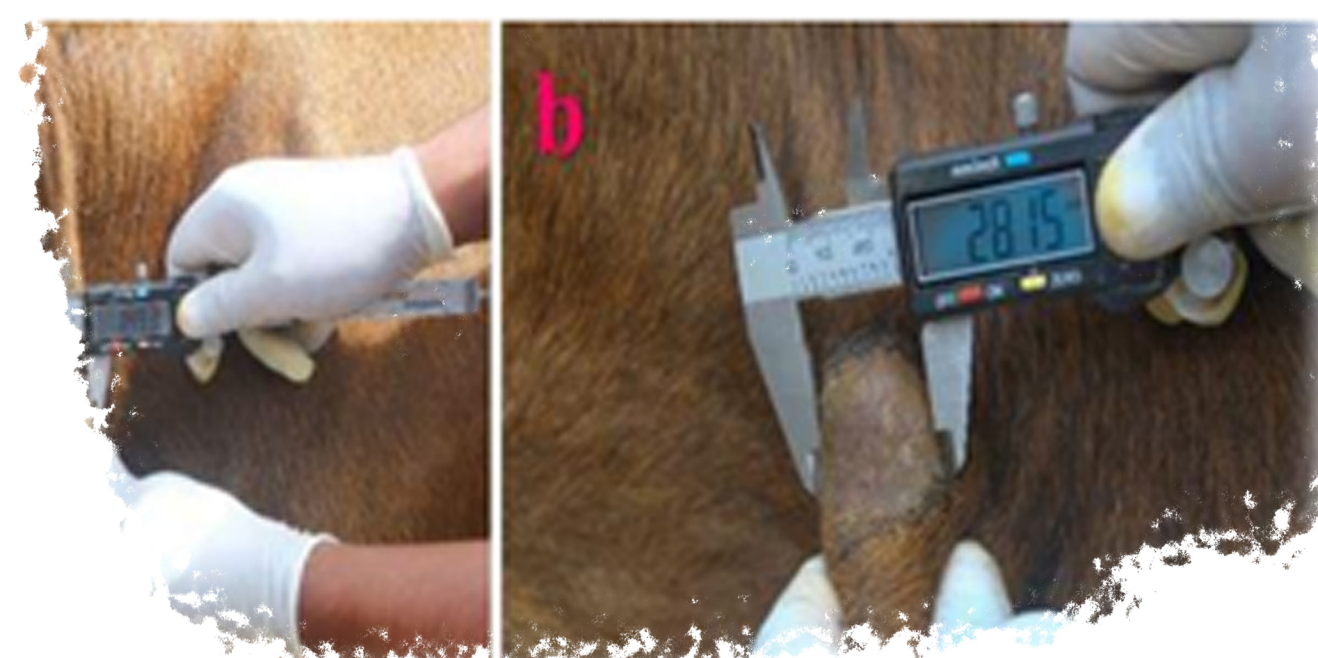
Started active surveillance in central province of Sri Lanka and passive surveillance in rest of the country.

bTB surveillance - Central province Sri Lanka

- **Objective** - Investigate the prevalence of the bTB among cattle and buffalo herds in the Central Province of Sri Lanka.
- **Cattle and buffaloes** were included as the study population. Calves under 6 months of age and cows with more than 7 months of pregnancy were excluded from the study
- **Sample size** – 616 animals
- **Performed** of SICCT test (Single Intradermal Comparative Cervical Tuberculin test)



Figure 1: Procedure for the SICCT test; a. avian site, b. bovine site.

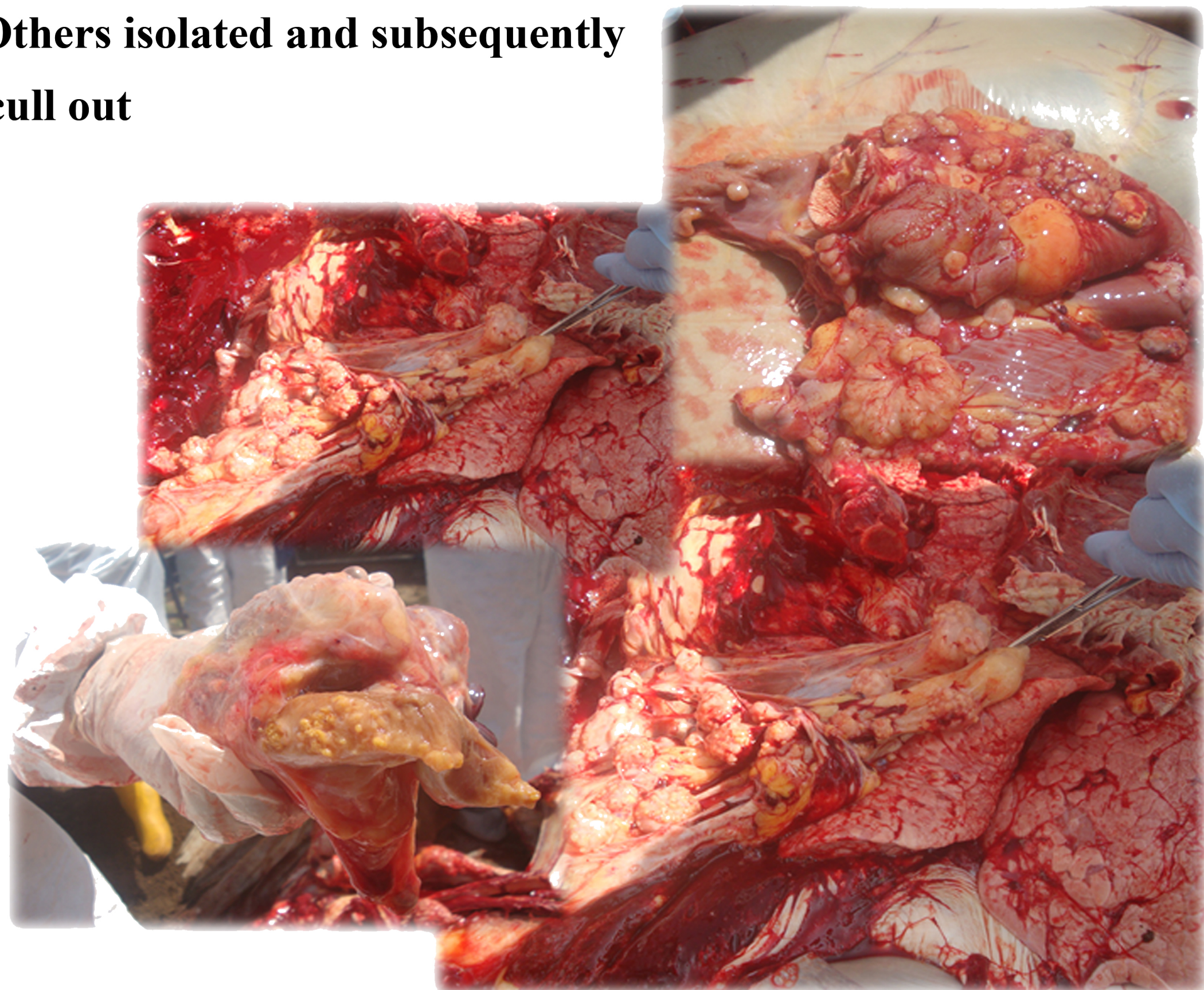


The estimated prevalence of bTB among cattle in the CP of Sri Lanka was 22.6%, as determined

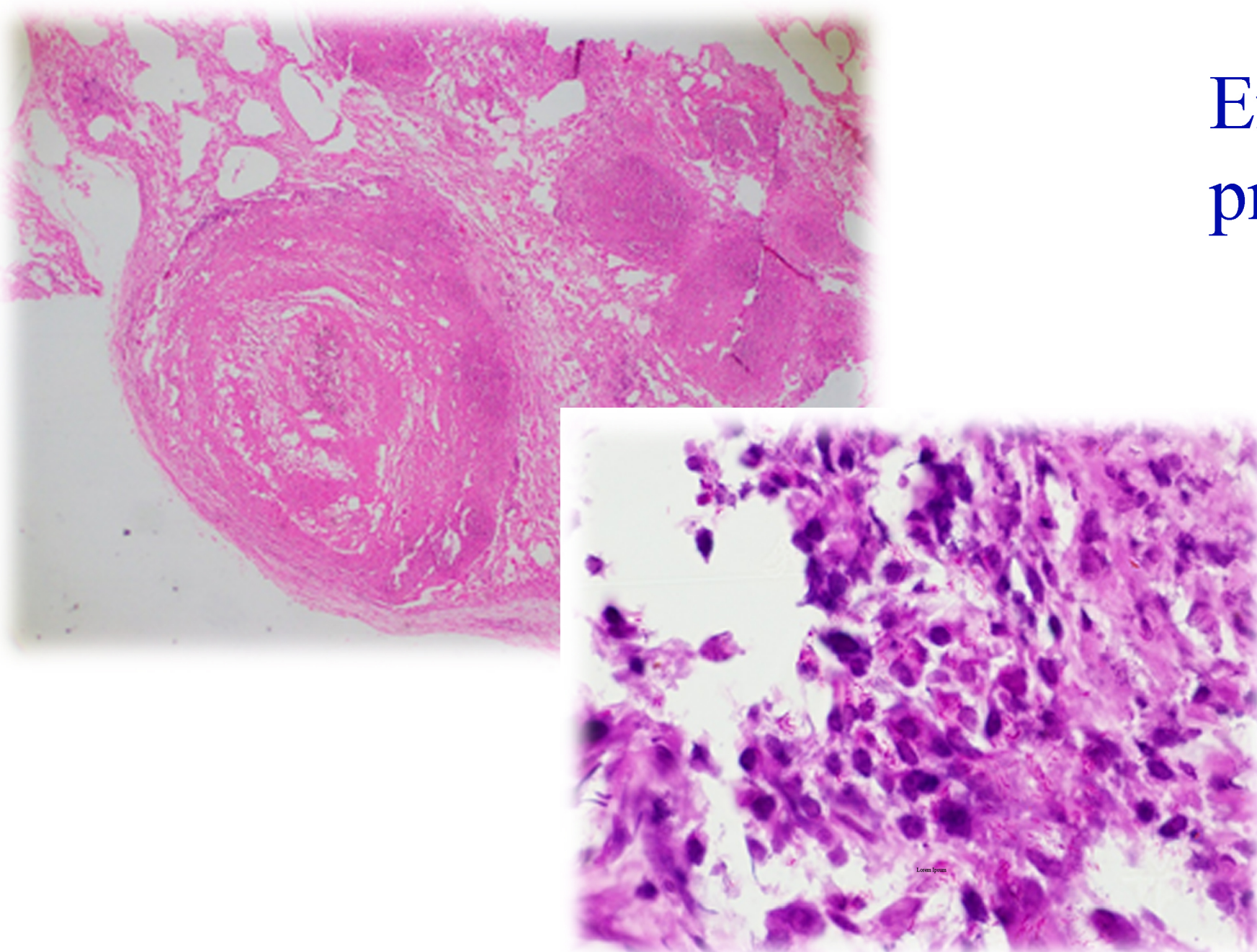
Postmortem lesions

Few cattle has shown clinical signs in due course

- Few cattle deaths were observed. (6)
- 54 cattle's were culled out immediately those who have shown clinical signs.
- Others isolated and subsequently culled out



Histopathology



Disease Diagnostics

- **Laboratory diagnostic capacity and current diagnostic tests used**
- **Histopathology**- Staining techniques –ZN, H&E,
- **PPD skin test for screening**
- **Gamma interferon assay - ELISA**

Disease Surveillance

Passive surveillance is conducted to suspected cases (suspected clinical signs)

Government farms and large commercial farms are conducting active surveillance biannually.

Positive reactors are isolated and subjected to cull after serology.



Disease Prevention and Control or Preparedness Strategy

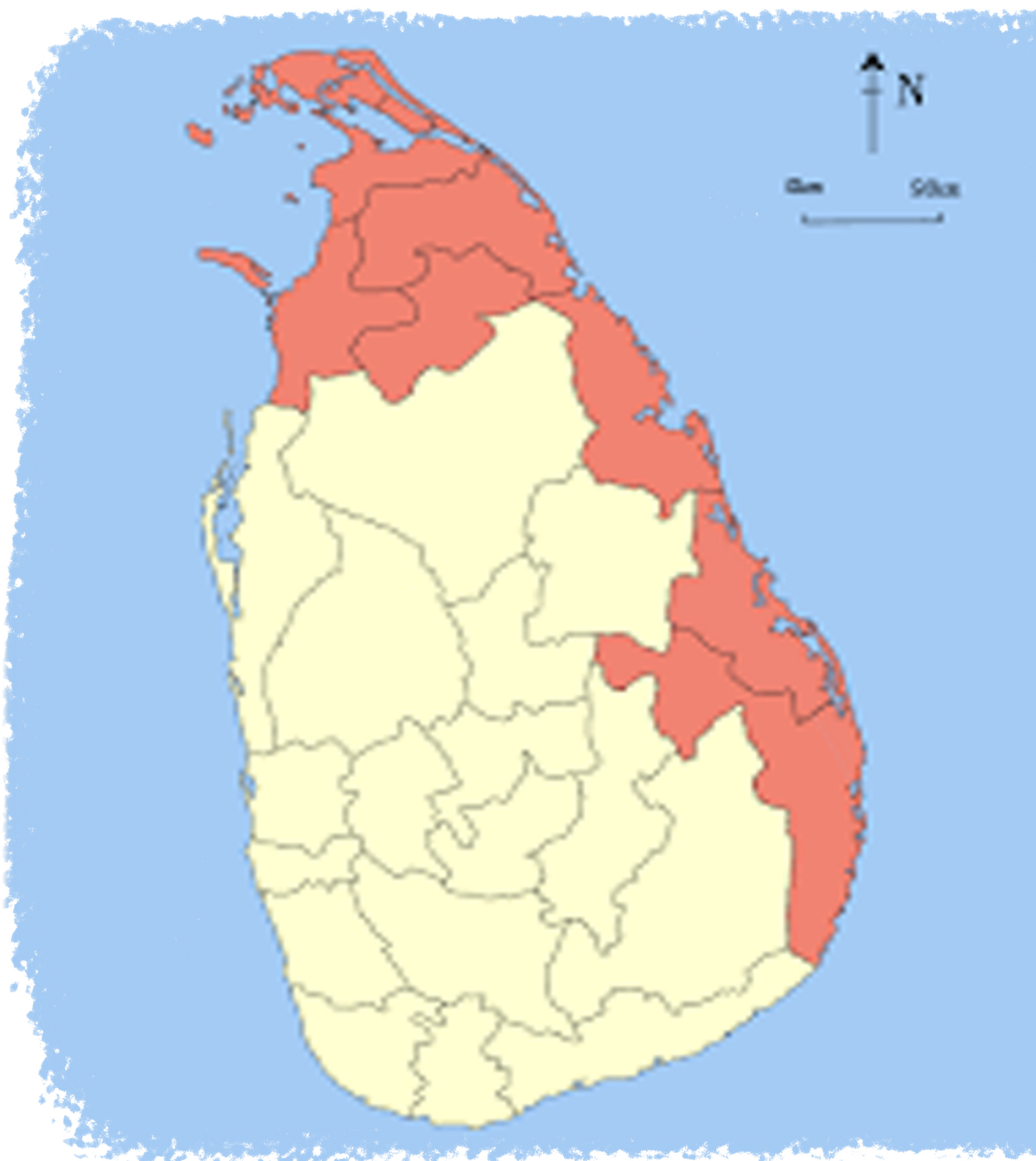
- **Prepared prevention plan for government and large scale commercial breeder farms 2023/2024.**
- Testing of animals for Tuberculosis
- Screening of animals in all farms annually by Tuberculin Skin Test (TST)
- If one or more animals are TST positive for annual testing in any farm, it will be considered as infected farm and positive animals will be immediately isolated within the farm for subsequent culling.
- An infected farm should be tested bi- annually
- The clinically diseased animal in all farms should be culled (slaughter) and disposed in the presence of a DAPH monitoring team
- Restocking should be considered only 2 yrs after the culling of animals after consultation with DAPH

Key challenges/issues

1. The prevalence of bTB in the cattle population is not known due to lack of reliable census data, testing, reporting and adequate policy and political will to eradicate the disease.
2. The extent of bTB in humans is unknown as no differentiation between MTB and bTB occurs routinely
3. Cattle testing will continue to rely on the SITT as gamma interferon serological tests are generally not an option due to cost, paucity of laboratories performing these tests, and time and temperature constraints involved.

Brucellosis

Endemic Disease in North Central and Eastern presence of other provinces



No human cases were reported

During the year 2022, Bovine brucellosis has been reported only in four provinces of Sri Lanka.

North Central	North WP	Uva	Eastern
46 cases	35 cases	115 cases	12 cases

Existing control policy and strategy

Sero surveillance

Vaccination of animal at risk with s19 vaccine

Restriction of movement and new animal introduction to herds

Milk ring test and bulk milk surveillance

Laboratory capacity

1 RBPT and MRT

2 CFT

3 PCR

Trained staff is present for essential field and lab work

Issues and Limitations

Proper compensation is not implemented

Negative social attitudes on such diseases