BRUCELLOSIS DIAGNOSTIC AND CONTROL IN INDONESIA



Siswani

Disease Investigation Centre (DIC), Maros

Directorate General of Livestock and Animal Health Services

Ministry of Agriculture

The Republic of Indonesia

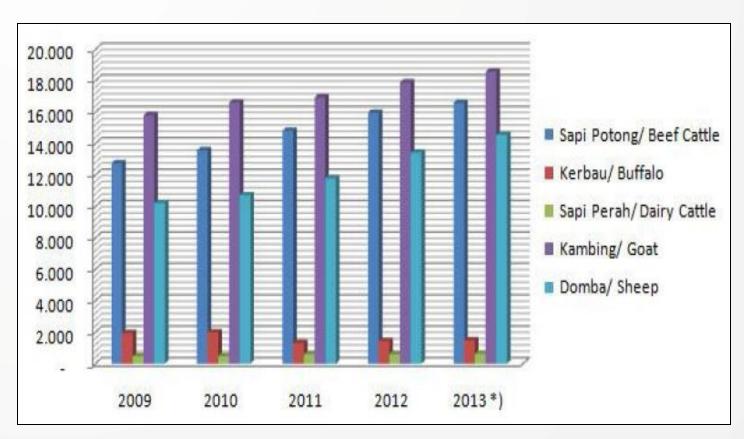
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Population of Ruminant in Indonesia from 2009 to 2013



LIVESTOCK POPULATION IN INDONESIA

Population of Ruminant in Indonesia During 2009 until 2013

JENIS	2009	2010	2011	2012	2013
Beef Cattle	12.760	13.582	14.824	15.981	16.607
Dairy Cattle	475	488	597	612	636
Buffalo	1.933	2.000	1.305	1.438	1.484
Goat	18.815	16.620	16.946	17.906	18.576
Sheep	10.199	10.725	11.791	13.420	14.560

SAMPLES TESTED FOR BOVINE BRUCELLOSIS

Total Samples Tested for Bovine Brucellosis at DIC Maros 2011-2013

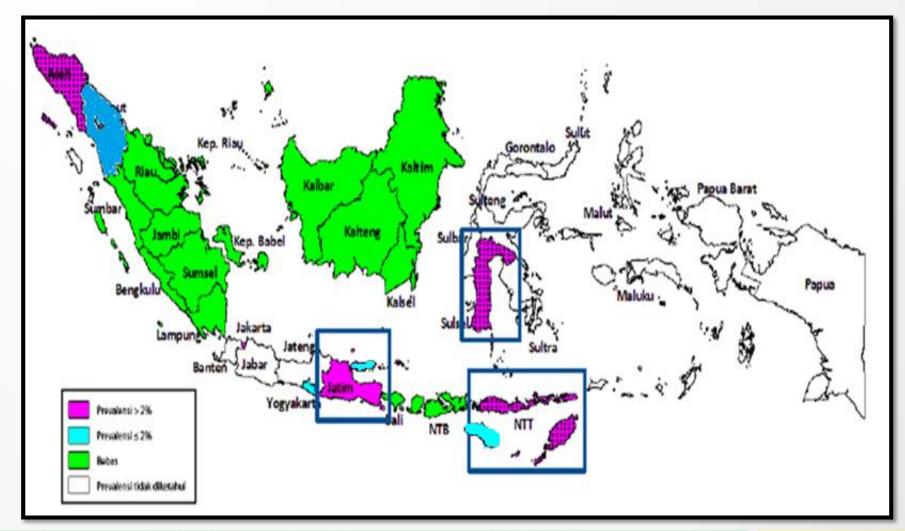
YEAR	SAMPLES	POSITIVE	NEGATIVE
2011	3.524	1.097	2.427
2012	5.794	942	4.852
2013	5.099	697	4.425
TOTAL	14.417	2.686	11.704

BRUCELLOSIS

- One of important animal diseases which become national priority for control and eradication programs
- First case discovered in dairy cattle in Bandung before war world II
- Currently spread over in most parts of Indonesia
- Strategy involving continues activities, routine and planning which covered all aspect in animal management



CURRENT BRUCELLOSIS SITUATION IN INDONESIA



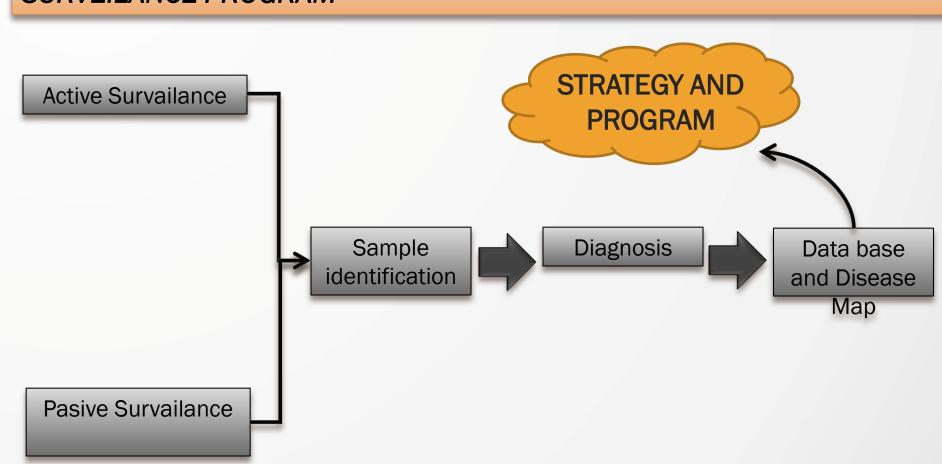
BRUCELLOSIS SURVEILANCE AND CONTROL PROGRAMS

- 1. SURVEILANCE
- 2. TEST AND SLAUGHTER
- 3. COMPENSATION
- 4. VACCINATION
- **5. LIVESTOCK MANAGEMENT**
- 6. QUARANTINE AND CONTROL OF ANIMAL MOVEMENTS
- 7. PUBLIC AWARENESS



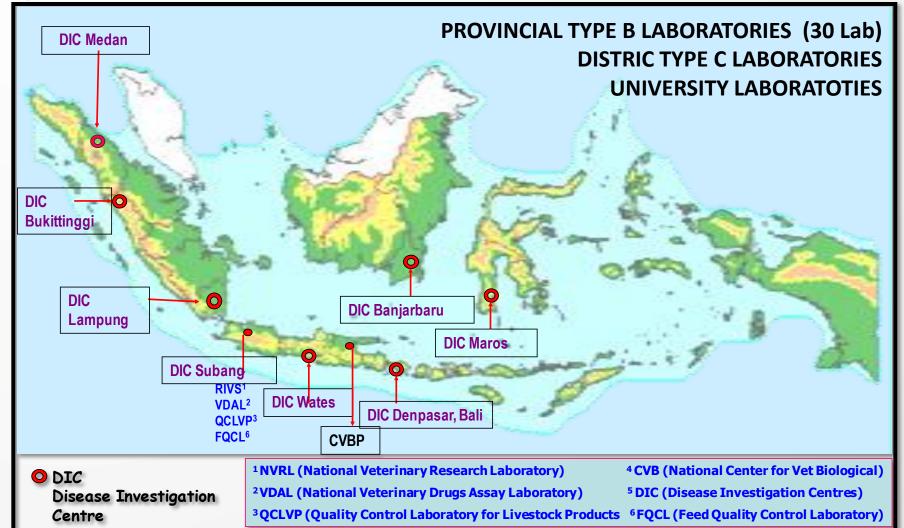
BRUCELLOSIS SURVEILANCE PROGRAMS AND CONTROL

SURVEILANCE PROGRAM





LABORATORY NETWORK IN INDONESIA





REGIONAL DISEASE INVESTIGATION CENTRE, MAROS

- One of 8 Regional Disease Investigation Centres in Indonesia
- The main functions include:
 - As National Reference Laboratory for brucellosis and BVD;
 - Disease Diagnosis;
 - Disease Investigation;
 - Regional Disease Mapping;
 - Disease Surveillance and Monitoring;
 - Post Vaccination Monitoring;
 - Applied Research



NATIONAL REFERENCE LABORATORY IN INDONESIA

DiC Wates: Anthrax, Avian Influenza, BSE, Salmonella

DIC Denpasar: Jembrana Disease, Hemorrhagic

Septicemia

DIC Maros: Bovine Viral Diarhea, Brucellosis

DIC Medan: Classical Swine Fever, PRRS

DIC Bukittinggi: Rabies

DIC Lampung: New Castle Disease, Infectious Bursal

Disease

DIC Banjarbaru: Surra, Infectious Bovine

Rhinotracheitis

DIC Subang: Avian Influenza



NATIONAL REFERENCE LABORATORY ACTIVITIES

- Maintain a network with other Reference Laboratories (AAHL-Australia)
- •Propose or develop methods and procedures that facilitate harmonisation of international standards and guidelines applicable to the other laboratory in Indonesia
- •Distribute to all laboratories in Indonesia biological reference products and any other reagents used in the diagnosis (ex:IBASS)
- Organize laboratory proficiency testing with other laboratories

IBASS is Indonesian Brucella Abortus Serum Standard

DIC Maros as National Brucellosis Reference Diagnostic Laboratory should provide reference control and other reagents for diagnostic

National Reference has been compared with International Serum Standard (OIE/WHO)

- Serology RBPT, ELISA or CFT
- PCR for further test or research purposes
- Bacterial Isolation and identification





- DIC Maros is becoming a National Reference Laboratory for Brucellosis in Indonesia complying with OIE TOR for reference laboratory
- Improving the survailance, technical support and supply of diagnostic kits supporting the brucellosis diagnosis and control system in Indonesia
- Proposing collaboration (twinning program) with OIE Reference Laboratories for brucellosis.
- participating in scientific meetings and other activities on behalf of the FAO-APHCA/OIE/DLD



THANK YOU

