

# One Health MYANMAR



## ZOONOTIC DISEASE SITUATION

Eight waves of HPAI occurred in Myanmar since 2006 to 2017. Total 108 reported poultry outbreaks since 2006. 1 Human case in 2007 (no mortality). Recent eight wave of HPAI occurred in MoneYwa Poultry production zone (7-4-2016) affecting chickens. H5N1 and H9N2 co-infection was identified in 2016 AI outbreak

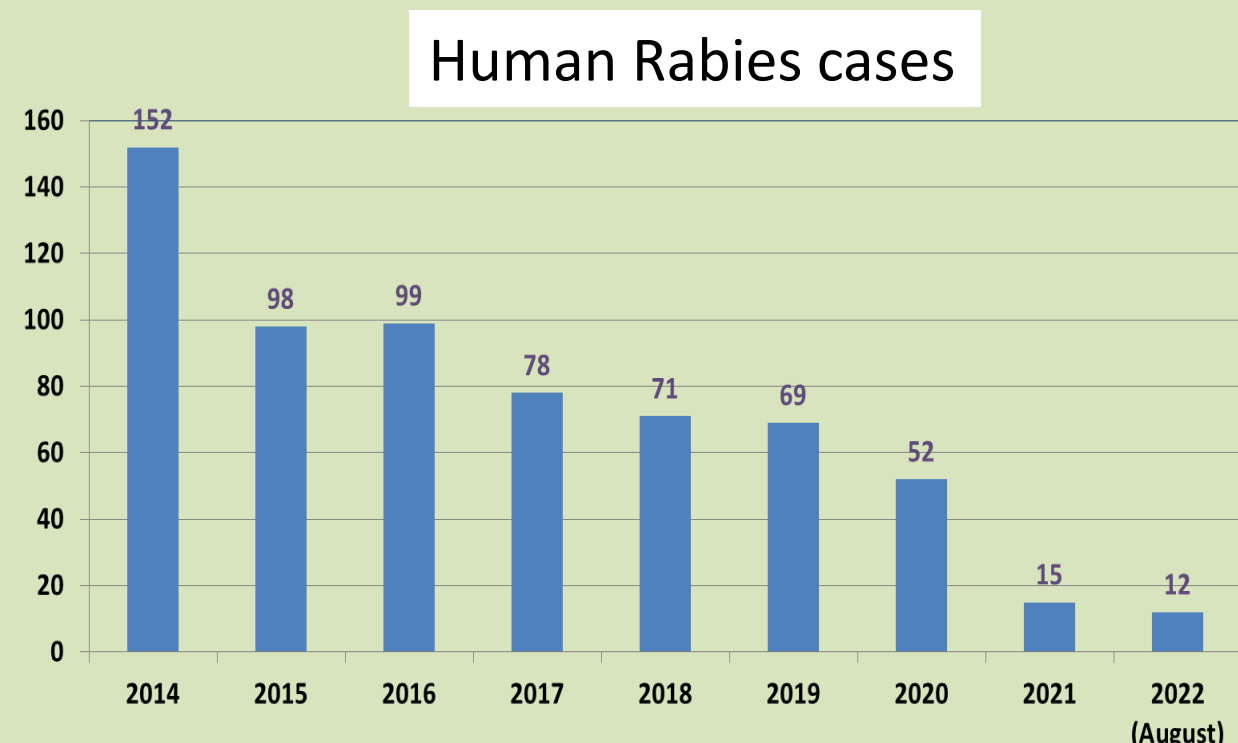
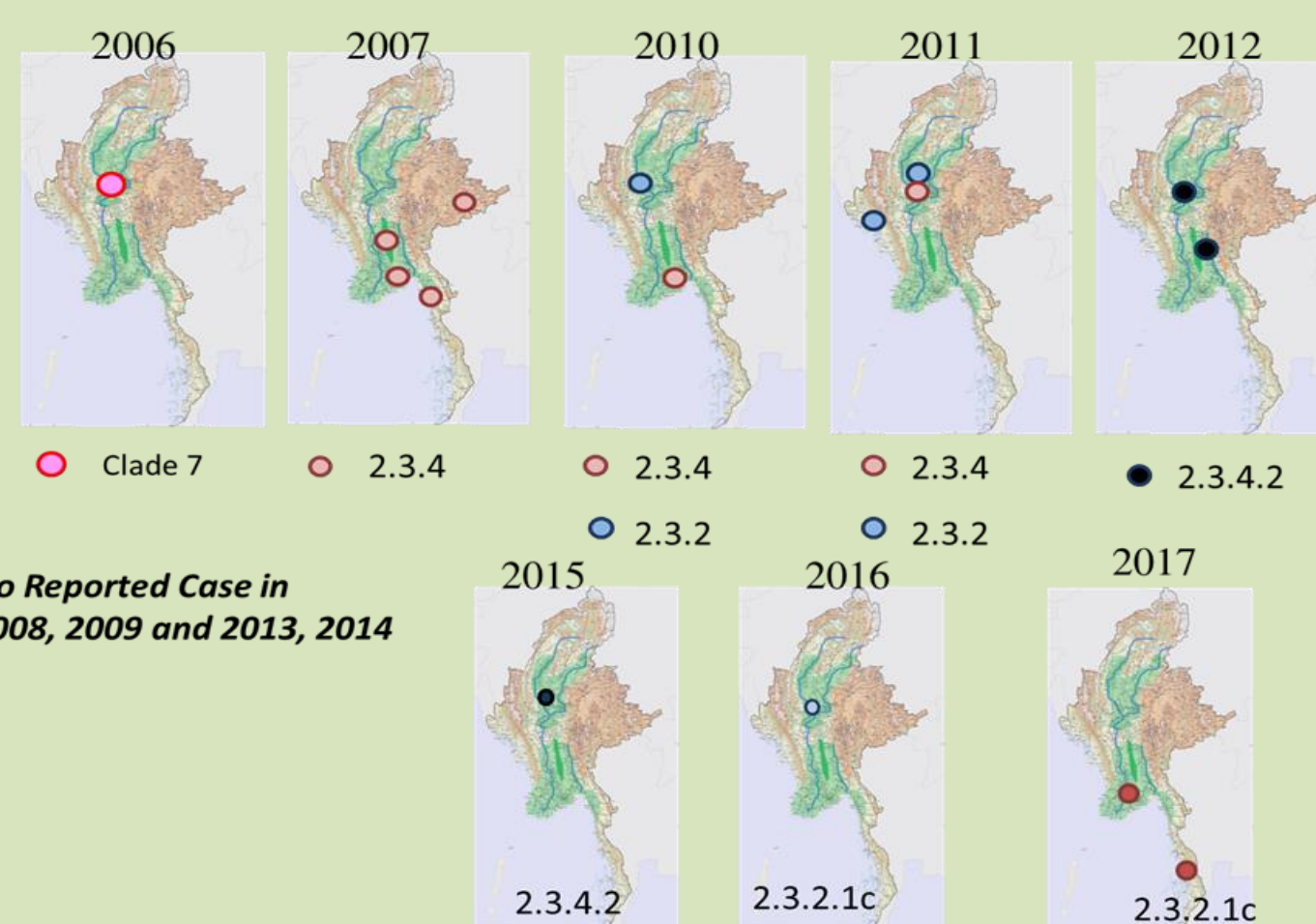
**One Health priority topics for Myanmar:**

AMR, antimicrobial resistance and

Six priority diseases/syndromes, namely,

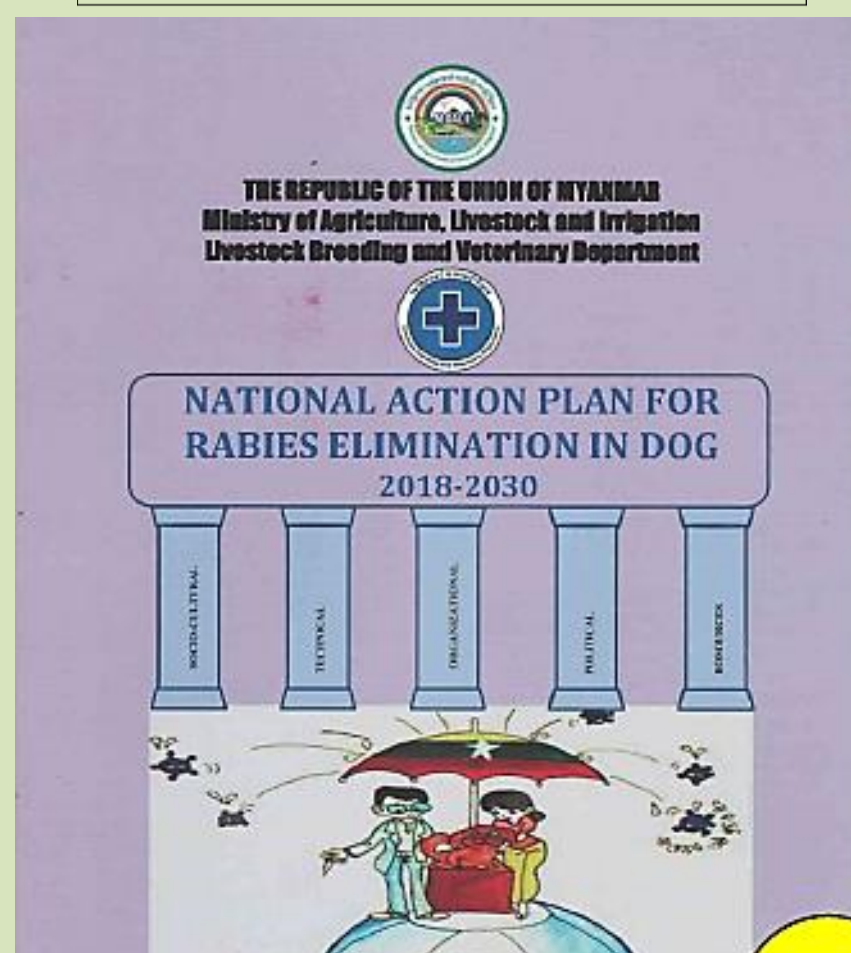
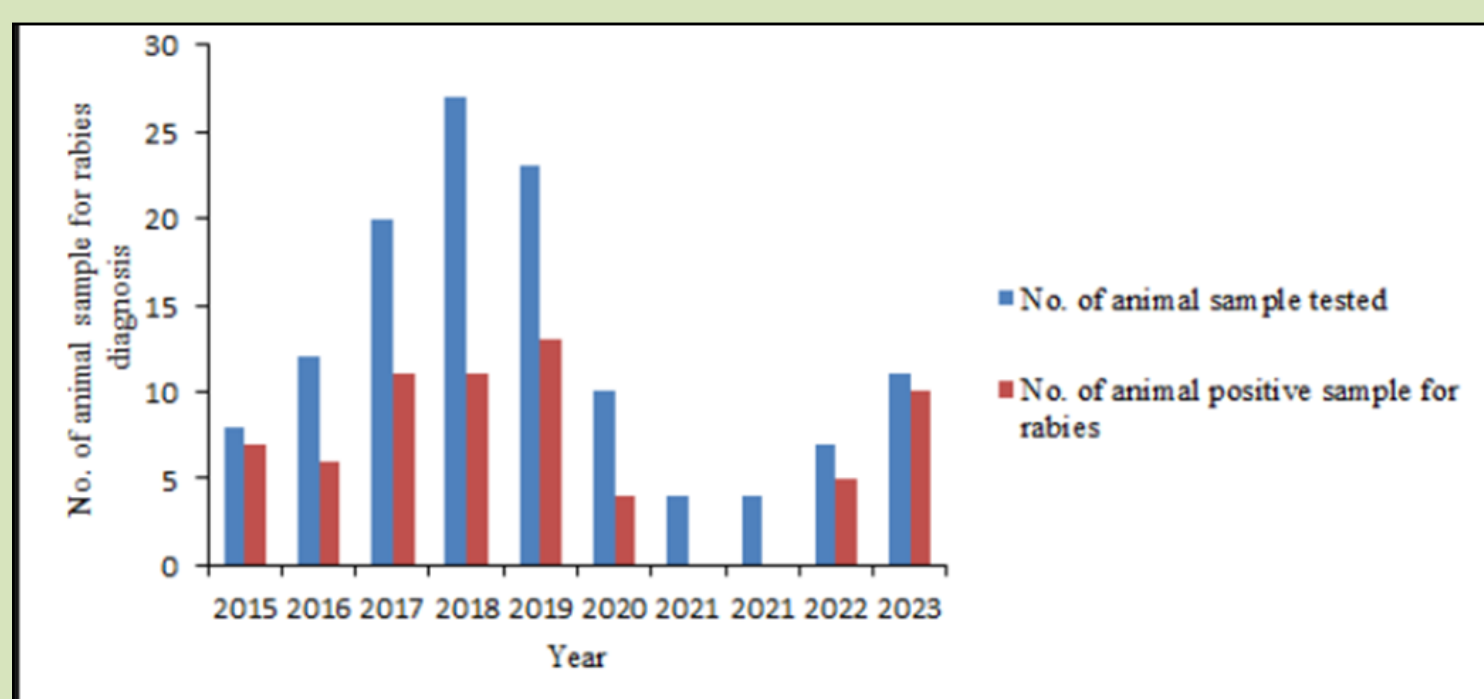
1. Rabies
2. Zoonotic influenza
3. TB, tuberculosis
4. Food-borne diseases (FBD)
5. Anthrax
6. Japanese encephalitis (JE)

Location Maps of 9 waves of HPAI H5N1 Outbreaks in Myanmar



Area- 261228 sq miles
Population-52 million
District-72
Townships-330
Villages-64,917
Dog population-6 million is estimated
Dog and human Population Ratio- 1:6
Stray Dog-70%
Annual Human Dog bite-20,000-60,000
Annual Animal Dog bite-unknown
Annual H rabies- 200
Annual A rabies-Mainly Dog, cat, horse, pig
Burden -unknown
Mostly affected - unknown, <15yrs?

Animal Rabies Laboratory Confirm cases



## One Health INITIATIVES

- Myanmar has National Strategic Plan for Prevention and Control of Avian Influenza and Human Pandemic Influenza Pandemic Preparedness and Response with steering from vertical working Committee, sub-committee
- Myanmar Avian Influenza Pandemic Plan, endorsed by National Health Committee in August 2005 covers planning and coordination, reducing human exposure, surveillance and early warning, rapid containment and response, health system response, social measures and communication
- National Contingency Plan for HPAI was developed by Livestock Breeding and Veterinary Department in 2007 and revised 2009
- Contingency Plan for Emergency Control of Low Pathogenic Avian Influenza (LPAI) was developed by LBVD in Junen2016
- Drafting One health Strategic Frame Work with Multisectoral Approach
- Strengthening of Laboratory capacity
  - BLS 2 and RT-PCR set up in LBVD lab , Proficiency Test participation
  - Human health National Laboratory has upgraded to BSL 2+
- International co-ordination and logistic supply engaged (FAO//WHO/UNICEF/USAID)

## Progress in One Health Co-ordination

- In the past since 2006, the influenza A(H5N1) outbreaks in the country, the Livestock Breeding and Veterinary Department (LBVD) and the Department of Public Health (DOPH) have worked together to fight against H5N1 in Myanmar. Since then, collaboration between the two sectors became more frequent and constructive.
- A Consultative Meeting on Emergency Assistance for Surveillance of H7N9 virus was held on 8 November 2013 in order to discuss with LBVD and DOPH on the potential collaboration and specific activities in the country
- A National Multisectoral Strategic Planning Workshop on H7N9 was held on 16 January 2014 with responsible officials from both sectors
- A meeting for high-risk countries (Lao, Myanmar and Vietnam) in Yangon 28 to30 April 2014, there was FAO/WHO led technical consultation to review preparedness, surveillance and response for Influenza A(H7N9)
- The Myanmar action plan for the National Joint Risk Assessment was developed in Joint Risk Assessment (JRA) orientation workshop held as an FAO, OIE & WHO tripartite initiative in Nay Pyi Taw on 16 January 2015
- The One Health Strategy Workshop held in Nay Pyi Taw on 9 and 10 March 2016 agreed that **One Health priority topics** and for Myanmar
- First draft of Myanmar OH Strategic Framework and Action Plan jointly developed

## KEY ELEMENT IN ADVANCEMENT

- ❖ FAO/WOAH/WHO have supported MoH (Ministry of Health) and LBVD (livestock Breeding and Veterinary Department ) for One health Strategy
- ❖ One Health Strategy Workshop was held on 9-19 March 2016, Nay Pyi Taw
- ❖ National IHR-PVS Bridging Workshop held in Nay Pyi Taw 9-12 September 2019



## CURRENT ISSUES AND CONSTRAINTS

- ❖ Competing priority issues and emerging and reemerging diseases
- ❖ Insufficient coordination and cooperation among sector
- ❖ Premature OH platform
- ❖ Networking for sharing information
- ❖ Limited human and financial resources

## LESSON LEARNED

- ❖ Response to outbreak by collaboration between animal health and human health sector
- ❖ Timely Information sharing and formal/informal communication
- ❖ Shared organizational responsibility, leadership at National and sub-national level
- ❖ We conclude that a One Health approach is the best option to mitigate outbreaks

## CHALLENGES

- ❖ Structure at country level to OH and OH focal points among animal health, public health and environmental sectors and coordination is not regular,
- ❖ Parallel animal and human health data bases are not linkable, data access is restricted and inadequate information sharing,
- ❖ Data on zoonotic diseases is limited. Surveillance systems do not capture adequate information on zoonotic events. Where available, the quality is low,
- ❖ Involvement of environmental sector and other players has been limited in case of zoonotic diseases is considered,
- ❖ Participatory surveillance is weak and minimum report from private practitioners
- ❖ Premature practice of OH concept
- ❖ Responses to zoonotic disease outbreaks have been disjointed and responded on own initiatives and planning but improved in COVID-19

## WAY FORWARD

- ❖ Development of National One Health Strategic Plan of Myanmar,
- ❖ Development and implementation of systematic programme on prevention and control strategies for Myanmar OH priority diseases/syndromes
- ❖ Greater compliance with FAO, WHO/IHR and WOAH guidelines on public health threats
- ❖ Risk maps and identification of hotspots for Myanmar OH priority topics
- ❖ Established plan and capacity for early epidemic detection, diagnosis, and rapid response
- ❖ Improved understanding of infection and transmission dynamics, ecology, and other drivers of zoonoses and emerging infectious diseases and
- ❖ Better understanding of socio-economic impacts of zoonotic diseases and their interventions to households and the government
- ❖ National IHR-PVS Bridging Workshop to be held