Member experience on prevention and control for Vector Borne Disease [The Republic of Maldives]

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World Organisation for Animal Health
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The Republic of Maldives

Introduction and Geography

Maldives is located on the equator which divides the North and South Pole. The country is stretched narrowly from the north to the south of the globe.

Maldives is made up of 1192 coral islands dispersed over an area of 90000 Square kilometers in Indian Ocean. Each Island is surrounded by sea. All these islands range in size.

99% of the Maldives is made up of sea.

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Country at glance

Total islands: 1190
Inhabited islands: 200
Resort islands: 172
The rest are uninhabited or used for agriculture and other livelihood purpose.

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Country at glance

Livestock sector

- The apex body responsible for setting standards for the livestock sector is the Ministry of Agriculture and Animal Welfare
- The Maldives primarily remains a fishing nation, with limited agricultural production.
- Livestock farming is small-scale, focusing on backyard poultry (chickens, ducks) and goats, often imported for cultural events or minimal farming practices.
- The limited land area and the island structure restrict large-scale livestock farming, contributing to fewer animal disease outbreaks.
- Goats: Native - it is not known exactly how and when goats came to the country.

Authorities Managing Vector Borne Disease situations

Human:

- The national government authority addressing vector-borne diseases in humans in the Maldives are Ministry of Health and Health Protection Agency under the Ministry of Health.

Animals:

- The national government authority addressing vector-borne diseases in animals is the Ministry of Agriculture and Animal Welfare.

Under their mandates, the Ministry of Health and the Ministry of Agriculture and Animal Welfare develop guidelines to detect, prevent, respond to and control VBDs in line with the health of the citizens and animals.

Vector Borne Disease situations

- The vector-borne diseases present in Maldives currently are:
  - Scrub typhus
  - Dengue
  - Helminthiasis
- The common vectors present in Maldives are:
  - African giant snail
  - Aedes mosquito
  - Trombiculid mites (Chiggers)
  - Cat fleas
- Though current endemic VBDs are not of great health risk, exotic VBDs pose a significant threat to the well-being of Maldivian island communities.

Detection capacity

- There are only 3 private veterinary clinics in the Maldives providing medical services which include consultation, vaccination, surgeries, microchipping and treatment for all types of pets (cats, birds, rabbits, turtles).
- There are **NO** veterinary laboratories in the Maldives which means there is limited local detection capacity in the Maldives.
- Only minimal testing can be carried out in veterinary clinics such as microscopy for diseases in pet animals.

Collaboration with other sectors under One Health approach

- **National IHR Coordination Committee with** One Health Working group established.
- **Pandemic Preparedness and Response Plan** jointly developed for zoonotic potential pandemics, guiding preparedness and response efforts.
- **Comprehensive Risk Assessment** conducted with animal, human and environment sectors – most recently regarding avian influenza, monkey pox and Nipah.

Possible solutions to strengthen the collaboration

- **Increased collaboration** on promoting an integrated approach to address existing and emerging health risks in the Maldives factoring in climate change-related impacts on human health and animal health.
- **Strengthening preparedness and resilience** through policy and governance and the One Health approach.
- **Identify strengths and gaps** in line with country priorities and WOAH standards.
- **Strengthen** disease diagnostic capacity, veterinary epidemiological, available human resources, surveillance, risk analysis, disease prevention and control activities.

Challenges and Gaps in Vector-Borne Disease Management

- **Lack of active and passive surveillance** for animal vector-borne diseases.
- **Vulnerability to emerging diseases**, especially given the geographical and ecological conditions of the islands.
- **Quarantine and border security,** there is lack of testing for imported animals and animal products at entry points, leaving the Maldives potentially vulnerable to the introduction of new diseases.
- **Lack of professional staff,** with a critical need to provide support and continued education to retain professional staff.
- **Lack of local veterinary laboratory,** which severely limits diagnostic capacity to detect and diagnose diseases.

Expectations for the VBDs workshop (Not Included in the Presentation)

- Learn the ways of developing and maintaining effective early warning disease detection and emergency response systems.
- Country experiences on contingency plans.
- Identify which role plays digital and technological innovation in vector-borne disease surveillance to detect, control and predict.
- Laboratory capacities of other countries.
- International networks on Vector-borne diseases.

Thank you

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