# Fleming Fund Phase II in Bhutan: Advancing AMR Surveillance and Capacity Building

The Fleming Fund, a UK aid initiative, supports low- and middle-income countries in addressing antimicrobial resistance (AMR). In Bhutan, the program has progressed from Fleming Fund Phase I (FF I)—which focused on infrastructure development, capacity building, and AMR surveillance—to Fleming Fund Phase II (FF II), which prioritizes sustainability, with a primary focus on AMR surveillance and capacity building under the One Health approach.

## **Key Focus Areas in the Animal Health Sector**

Under FF II, the National Centre for Animal Health (NCAH) has been identified as the beneficiary institution, responsible for leading AMR surveillance and antimicrobial use (AMU) monitoring in the animal health sector.

#### **AMR Surveillance in Animal Health**

- **Phase I:** Surveillance Plan for AMR in Commercial Broiler and Layer Chicken Population in Bhutan was conducted to establish a baseline for antimicrobial resistance in poultry.
- **Phase II:** Clinical Surveillance for Antimicrobial Resistance in Mastitis Cattle in Bhutan is being implemented, focusing on bacterial pathogens and resistance patterns in dairy cattle.

#### **Surveillance Laboratories**

- National Veterinary Laboratory, NCAH, Serbithang
- Regional Veterinary Hospital and Epidemiology Centre, Phuentsholing
- Regional Livestock Development Centre (RLDC), Kanglung

#### **Antimicrobial Stewardship Program**

• The National Veterinary Hospital will take the lead in initiating antimicrobial stewardship (AMS) activities, promoting responsible antibiotic use in veterinary practices.

# **Funding and Implementation Timeline**

The total grant allocated for Bhutan under FF II is **Nu. 134,866,834** (£1.5 million), of which **Nu. 18,008,334** is designated for AMR and AMU surveillance in animal health.

• **Inception Phase:** Completed in July 2024

- Implementation Phase: The Detailed Technical Implementation Plan (DTiP) for AH commenced in October 2024
- **Project Duration:** The grant is expected to be fully implemented by December 2025

## **Technical Support and Sustainability Measures**

To support some of the activities under the detailed implementation of the Country Grant (CG), the Regional Grant, Antimicrobial Resistance and One Health (AMROH), Massey University, New Zealand, has been identified as a technical partner.

Additionally, three Fleming Fellows (Cohort 4)—specializing in Policy, AMR Surveillance, and AMU Surveillance—are being professionally trained under Peter Doherty Institute to ensure the long-term sustainability of Bhutan's AMR program.

#### Conclusion

Fleming Fund Phase II marks a critical step in strengthening Bhutan's AMR surveillance and laboratory capacity in the animal health sector. By shifting from infrastructure development to surveillance, capacity building, and antimicrobial stewardship, the initiative aligns with Bhutan's National Action Plan on AMR and the One Health approach, ensuring a sustainable, evidence-based response to AMR challenges.

Prepared by - Puspa M Sharma, FF Focal for AH, NCAH

Date- 06 February 2025