ANIMAL DISEASE SURVEILLANCE IN PACIFIC ISLAND COUNTRIES AND TERRITORIES

MONITORING AND CONTROLLING ANIMAL HEALTH TO PROTECT ECOSYSTEMS

Elenoa Salele
PHOVAPS CORDINATOR
SPC

PHOVAPS
Pacific Community
Communauté du Pacifique
World Organisation for Animal Health
Founded as OIE
Australian Government
Department of Agriculture, Fisheries and Foresty
Ministry for Primary Industries
Manatū Ahu Matua
NEW ZEALAND
FOREIGN AFFAIRS & TRADE
Manatō Aorere

SURVEY OVERVIEW AND STRATEGIC CONTEXT

PURPOSE OF THE SURVEY

Survey Objective

The survey supports design and implementation of tailored animal health surveillance in Pacific Island countries.

Framework Alignment

Aligns with Pacific Animal Health Framework 2021–2025 to operationalise efficient surveillance systems regionally.

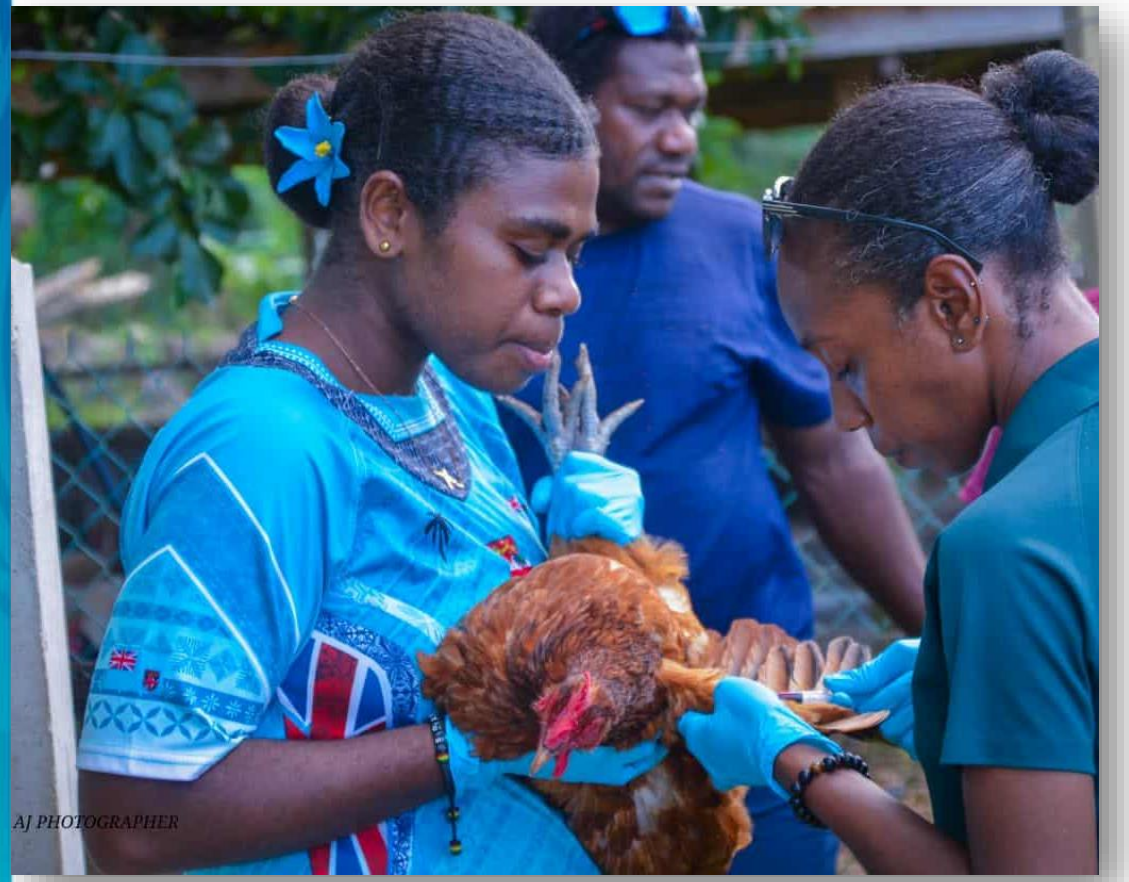
Survey Goals

Gather insights on current surveillance, identify challenges, and propose future conceptual framework for monitoring.

Long-Term Vision

Build resilient surveillance systems to safeguard public health, food security, and economic stability in the Pacific.

STRATEGIC CONTEXT



Collaborative Partnerships

SPC and WOAH partnership strengthens national animal disease control and aligns with international health standards.

Key Priorities Identified

PHOVAPS focuses on surveillance enhancement, diagnostic improvements, workforce development, and funding solutions.

Geographic and Logistical Challenges

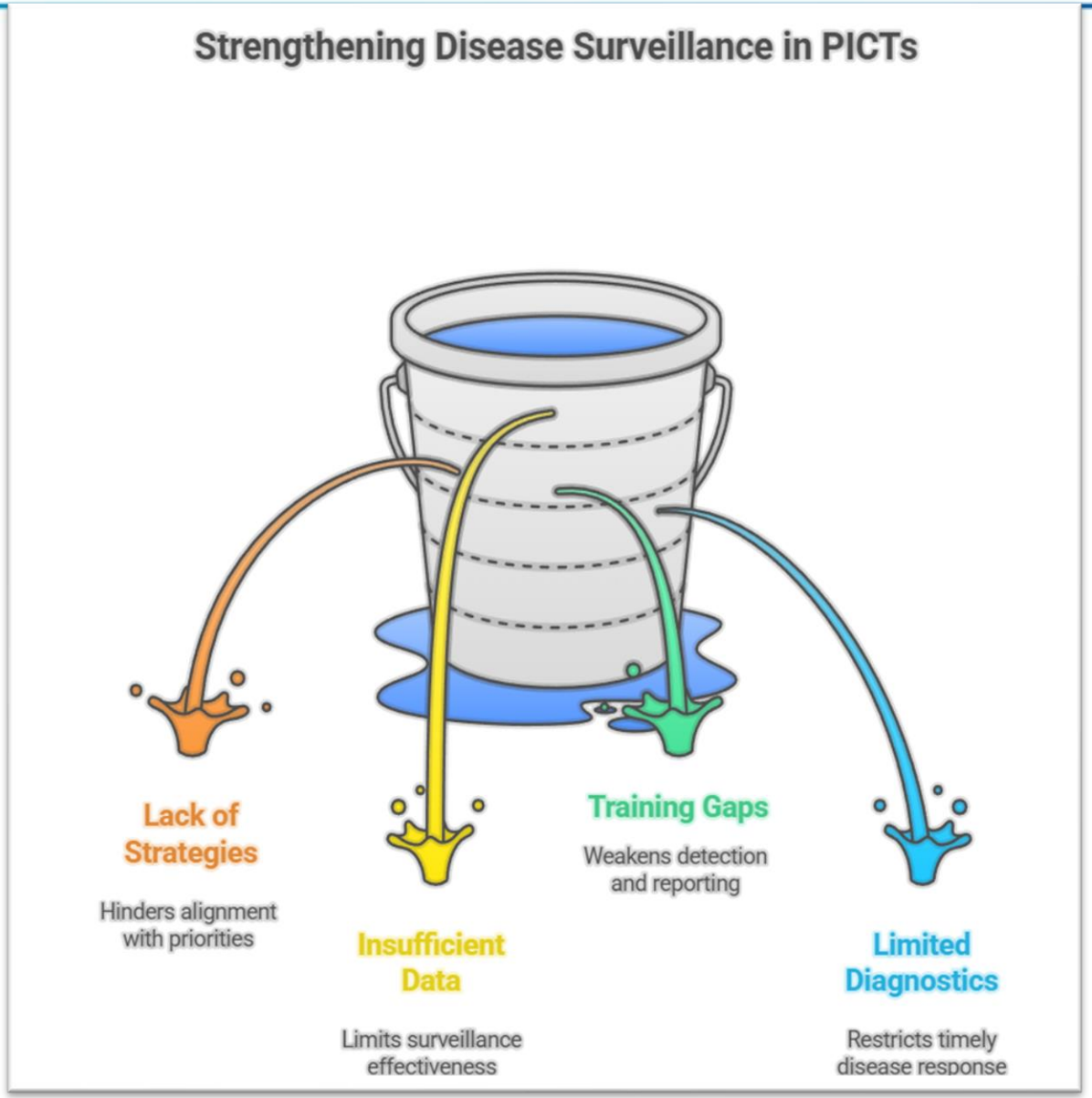
Remote and dispersed Pacific islands create logistical challenges requiring innovative, collaborative surveillance methods.

Capacity and Resource Constraints

Many PICTs lack veterinarians and infrastructure, highlighting need for coordinated regional strategy and resource sharing.

CHALLENGES AND PARTICIPATION

KEY CHALLENGES IDENTIFIED



SURVEY PARTICIPATION

Survey Response Rate

- 15 out of 20 Pacific Island countries responded, achieving a 75% participation rate for the survey.

Regional Diversity

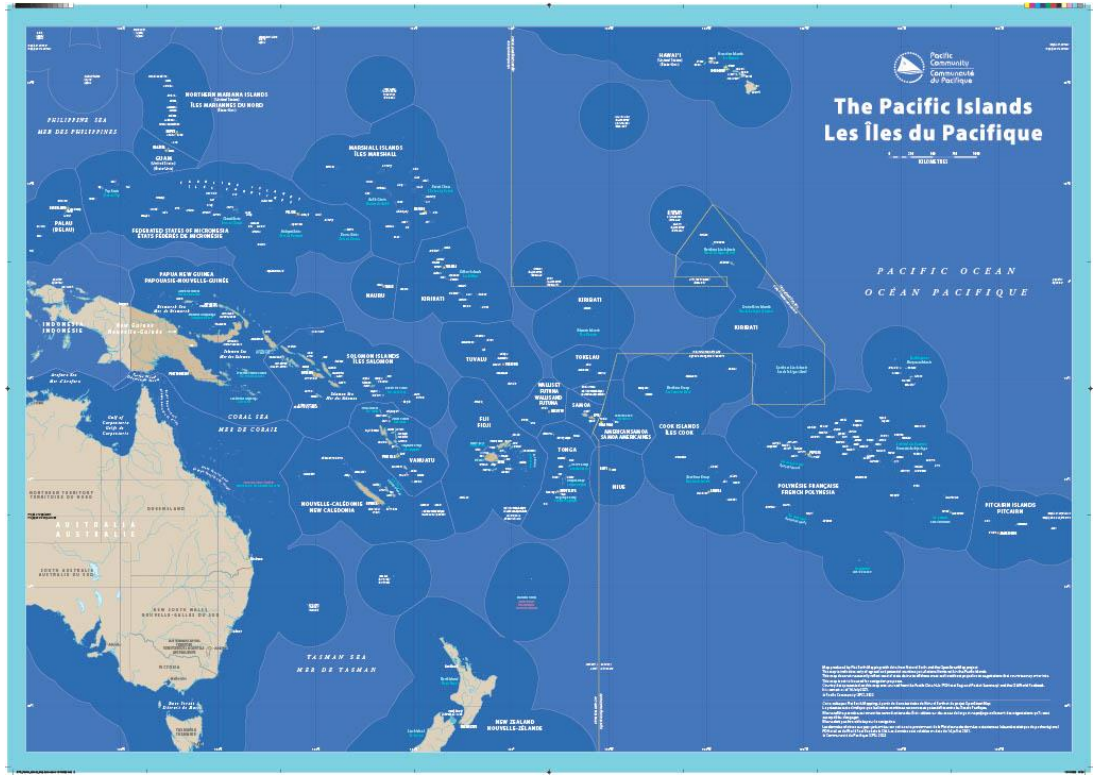
- The survey included countries from Melanesia, Micronesia, and Polynesia, providing broad regional insights.

Data Collection Methods

- Combination of online tools, personalized emails, and phone calls were used to encourage survey participation.

Data Limitations and Insights

- Some responses lacked detail, reflecting varied surveillance capacity but still offering valuable strategic insights.



SURVEILLANCE PRIORITIES AND ACTIVITIES

SURVEILLANCE PRIORITIES

PRIORITY	DISEASE
1	High pathogenic avian influenza
2	African swine fever
3	Brucellosis
4	Leptospirosis
5	Bovine tuberculosis
6	Foot-and-mouth disease
7	Mastitis, Metritis, Agalactia (MMA) syndrome
8	Anaplasmosis
9	Infectious bursal disease
10	Q-fever
11	Bovine venereal campylobacteriosis
12	Aujeszkies
13	Newcastle disease
14	Rabies
15	Fowl pox

SURVEILLANCE ACTIVITIES

YEAR	COUNTRY	ACTIVE SURVEILLANCE INITIATIVE	N ANIMALS SURVEYED
2017	New Caledonia	Bovine diseases (10 tested)	1553
2020	PNG	ASF Delimiting Survey	200
2020	Vanuatu	Endemic and exotic disease survey	436
2022	Cook Islands	Multiple species and agents	50
2022	New Caledonia	Pig diseases (SHV1, SDRP, ASF, JE)	335
2023	Samoa	Multiple species and agents	278
2023	Vanuatu	Endemic and exotic disease survey	900
2024	Tonga	Baseline survey	200

CAPACITY AND DIAGNOSTICS

WORKFORCE AND TRAINING

Workforce Capacity Gaps

- Many PICTs lack qualified experts and capacity for clinical exams and livestock field investigations.

Training Challenges

- Virtual training faces barriers like poor internet access and low engagement; in-person practical training is preferred.

Capacity Development Needs

- Mentoring, on-the-job learning, and structured plans are essential for sustainable animal health service improvements.

DIAGNOSTIC CAPACITY

Limited Local Testing

- Few PICTs have in-country labs and formal specimen shipping arrangements, limiting diagnostic reach.

Challenges with Pen-Side Tests

- Pen-side diagnostic tests face sustainability issues due to donor reliance and expired or poorly stored kits.

Impact on Disease Control

- Lack of reliable diagnostics delays outbreak detection and response, risking undetected disease spread.

Strengthening Diagnostic Systems

- Tailored plans with regional labs, portable equipment, and One Health integration can improve diagnostics.

SURVEILLANCE MODELS AND RECOMMENDATIONS

CONCEPTUAL SURVEILLANCE MODELS

- Low-Resource Model

Focuses on passive surveillance using livestock education, syndromic recognition, and simple data tools for cost-effective monitoring.

- Well-Resourced Model

Incorporates active surveillance, strategic planning, and integrated diagnostics within a One Health framework for advanced monitoring.

- Sustainability and Capacity Building

Mentoring, training, and information management are essential to ensure sustainable and effective surveillance systems.

RECOMMENDATIONS AND NEXT STEPS

- **Develop Surveillance Strategies**

Create national and regional surveillance strategies with clear objectives and operational plans.

- **Enhance Para-Veterinary Training**

Strengthen para-veterinary training through practical components, mentoring, and competency assessments.

- **Improve Data Management**

Upgrade data systems to support real-time analysis and informed decision-making.

- **Establish Regional Support Hubs**

Set up regional veterinary and epidemiological hubs for technical guidance and oversight.

- **Align Donor Support**

Coordinate donor investments with country-specific priorities for sustainable impact.