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Institute Year End Report 2024

TABLE OF CONTENTS

DIRECTOR'S STATEMENT	. '
2024 ACHIEVEMENTS	4
COMPLETED PROJECTS	5
CURRENT PROJECTS	10



DIRECTOR'S STATEMENT

In an increasingly interconnected world, the threat posed by transboundary and zoonotic diseases is greater than ever before. These diseases not only jeopardize animal health but also pose significant risks to human populations and global economies. As the Director of the Institute for Infectious Animal Diseases (IIAD), I would like to emphasize our commitment this past year to mitigating these threats through research, surveillance, and collaboration.

At IIAD, we are dedicated to enhancing preparedness and response capabilities through innovative research and technology-driven solutions. Our experts work closely with national and international partners, including government agencies, academia, and industry stakeholders, to develop cutting-edge diagnostic tools, vaccines, and disease monitoring strategies.

We prioritize capacity building and knowledge sharing to empower frontline workers and decision-makers with the skills and information necessary to prevent and control disease outbreaks. Our collaborative initiatives aim to strengthen biosecurity measures, improve disease reporting systems, and foster global partnerships for a more resilient future.

As we face emerging and re-emerging infectious diseases, IIAD remains steadfast in our mission to protect both animal and public health. By fostering scientific innovation, policy integration, and cross-sector cooperation, we can build a world better equipped to handle these complex situations.

Together, we can safeguard the health of animals, humans, and ecosystems alike. I encourage all stakeholders to join us in this vital endeavor.

Dr. Heather Simmons
IIAD Director

Or. Heather Simmons



THE INSTITUTE CONTINUES TO SUPPORT VETERINARIANS IN THEIR EFFORTS TO MAINTAIN AND UPHOLD ONE HEALTH EFFORTS

SUPPORTING ONE HEALTH

Transboundary animal diseases have the potential to spread rapidly across borders, causing substantial economic and food security concerns. Zoonotic diseases underscore the critical connection between animal and human health. Addressing these challenges requires a multidisciplinary approach that bridges veterinary, medical, and environmental sciences.



2024 ACHIEVEMENTS

In 2024, the Institute strengthened national and international partnerships through collaborative efforts within the One Health and animal health space with awarded projects focused on biosecurity, emergency management, epidemiological surveillance, capacity building, diagnostic testing, disease control and management, and risk assessment trainings.

\$4.6M IN FUNDING

Over the year 2024, IIAD managed over \$4.6 million dollars in funding from sponsors for implementing national and international programs.

21 PROJECTS MANAGED

The Institute managed 21 awarded grants for proposed projects in 2024 focusing on building one health, supporting animal health, ensuring food security, and developing trainings on capacity-building.

12 COLLABORATING COUNTRIES

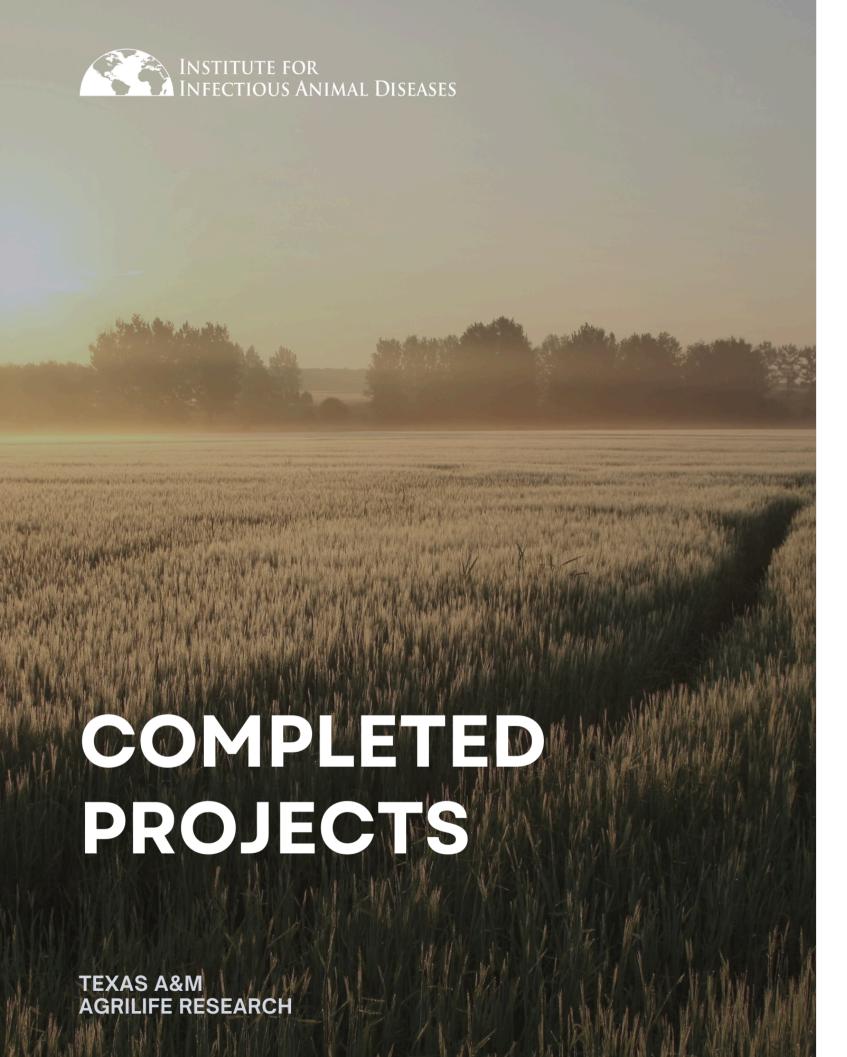
IIAD continues to grow a large robust international network, executing capacity development activities for donors across Africa, Europe, and Southeast Asia.

74 PARTNERING ORGANIZATIONS & PARTNERS

The Institute collaborated with 25 international and national organizations in addition to 27 external researchers and consultants, 12 Texas A&M faculty, 8 graduate students, and 2 veterinary externs.

23 PROPOSALS SUBMITTED

IIAD submitted 23 proposals over the course of 2024 with 6 project proposals awarded and 11 project proposals currently pending.



SMP-AH SURVEILLANCE & RISK ASSESSMENT

With partnering organizations from Africa, IIAD conducted 4 English and French virtual trainings between 2022 and 2023, focusing on syndromic surveillance and risk analysis and assessment to educate epidemiologists, veterinarians, and other animal health specialists located in African regions on SMP-AH principles and practices. In 2024, two additional virtual trainings in diagnostic epidemiology were conducted. This project was funded by <u>USDA-FAS</u> and in partnership with the <u>African Agricultural Technology Foundation (AATF)</u> and the <u>African Union-International Bureau for Animal Research (AU-IBAR)</u>.



POINT-OF-CARE TEST ADAPTATION PROCESS

From 2022-2024, IIAD and project partners solicited national and international experts to develop a Point-of-Care (POC) diagnostic testing framework process, refine it via expert elicitation, and then validate it via a tabletop exercise.

The project team conducted the NAHLN POC workshop in 2023 in Dallas-Fort Worth, Texas with 28 key stakeholders in attendance. The project team and experts validated the process, identified areas for improvement, recognized planning gaps, and provided input to sponsors from <u>USDA APHIS</u>, <u>VS</u>, and <u>NAHLN</u> concerning the impacts of current emergency response plans.

DISEASE CONTROL & EMERGENCY MANAGEMENT FRAMEWORK

This effort supported the integration of Foot-and-Mouth Disease (FMD) competency gaps from participating countries and the current Disease Control and Emergency Management Framework competency framework, which is part of the EuFMD project TOM Training Management System, providing suggested adaptations for central veterinarians in Africa, Middle East, and Asia.

The new framework is expected to allow Veterinary Services to map the competencies of individuals in supporting the activities required for progressing through the Progressive Control Pathway for FMD (PCP-FMD), indicating the relevant competencies and the required level of competence they should hold.

CSTE INFLUENZA ZOONOSES EDUCATION AMONG YOUTH IN AGRICULTURE

This project received another round of funding from 2023 through 2024 and focused on the development of influenza educational activities for youth within the United States.

The Veterinary Science Certificate Program (VSCP) in Texas A&M AgriLife Extension Service led the project's efforts and coordinated with IIAD for the development of a sustainability plan for national actions with the Council for State Territorial Epidemiologists (CSTE) through sponsorship by the Centers for Disease Prevention and Control (CDC). In-person project activities and interactions with youth were conducted through VSCP.

FIELD TRAINING PROGRAM FOR WILDLIFE, ENVIRONMENT, BIODIVERSITY & ECOSYSTEMS (FTP-WEBE) IN INDONESIA

This project was designed to deliver "training through service" and meet the critical need for environmental professionals who can protect biodiversity, ecosystems, and natural resources. IIAD personnel traveled to Indonesia to facilitate this training alongside the Indonesia Ministry of Environment and Wildlife.

This effort also strived to improve upstream interventions to prevent spillover of infectious pathogens under a One Health approach. Responses at the frontline level will effectively and sustainably strengthen disease detection and response within the human-environment-wildlife-livestock interface.



2024 INSTITUTE YEAR END REPORT



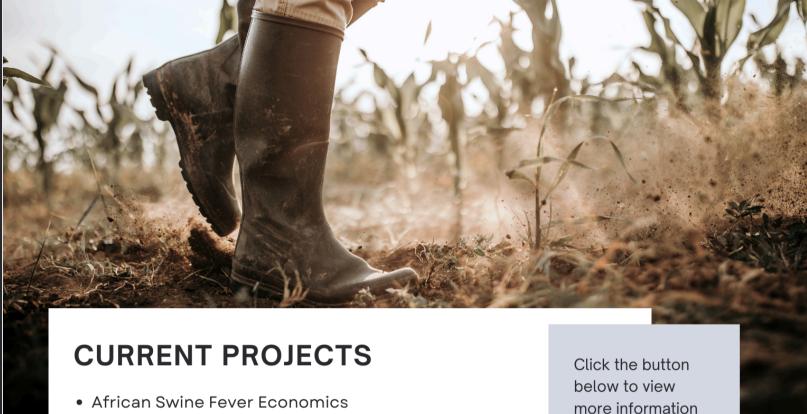




The Institute aims to deliver knowledgebased solutions to some of the toughest issues facing food animal agricultural sectors, both domestically and abroad with continuous adaptability and development.

We work to provide capacity development training programs and curricula for realworld application focusing our efforts in the United States and countries spanning across Europe, Southeast Asia, and Africa.

The IIAD team continuously collaborates and partners with U.S. agencies, industries, and international organizations to develop and deliver our programs. Our main goals are to reinforce emergency preparedness, support disease prevention and response, and enhance biosecurity and biosafety measures within the food supply chain.



additional details at iiad.tamu.edu

regarding our

current projects

our website for

and efforts or visit

OUR PROJECTS

- African Swine Fever Economics
- Animal & Plant Health Joint Criminal-Epidemiological **Investigations Course**
- Biosecurity Plan Evaluation for Texas Poultry Farmers
- Completion of the Healthy Border 2030 Roadmap
- Emergency Management Curriculum eModules
- Enhancing Diagnostic Methods for ASFv between NAHLN Laboratories, State Animal Health Officials, and Industry
- FAD & Decon Producer Certificate Training Programs
- Minnesota One Health Symposium
- Strengthening Veterinary Health Systems for African **Union Trade**
- Tri-State Feedlot Readiness Assessment for FMD Prevention and Response
- Ukraine Emergency Veterinary Medicine Assessments
- Veterinary Recruitment Toolbox for Rural Communities

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