

Applied Biosystems: Comprehensive Animal Health Diagnostic Tools



ThermoFisher
SCIENTIFIC

Thermo Fisher Scientific
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To enable our customers to make the world healthier, cleaner, and safer

Thermo Fisher's Animal Health diagnostic technologies include advanced tools such as the Avian Influenza Kit, VetMAX Master Mixes, MagMAX Core Sample Extraction Kits, and the QuantStudio 5 Real-Time PCR system. Together, these tools are designed for the precise detection of animal pathogens, especially avian influenza, through high-sensitivity PCR-based diagnostics.

This technology is **pre-validated**. Scaling readiness: idea maturity 9/9; level of use 9/9

Gender assessment

Climate impact

Problem

- High Economic Impact:** Outbreaks like avian influenza cause mass culling and major economic losses, affecting food security.
- Yield Losses:** Disease outbreaks in livestock reduce productivity, impacting farmers' incomes, especially for smallholders.
- Limited Lab Resources:** Many veterinary labs lack resources for reagent preparation and complex diagnostics, limiting accessibility to reliable testing.

Solution

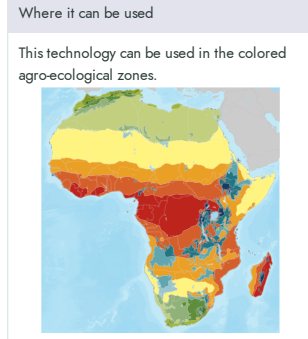
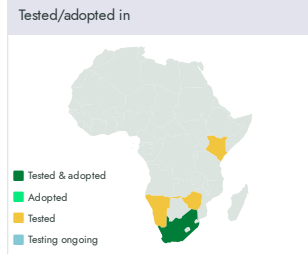
- High Sensitivity and Specificity:** Real-Time PCR Kits (e.g., Avian Influenza Kit) detect low pathogen levels for early disease detection and containment.
- Streamlined Sample Processing:** MagMAX Kits simplify DNA/RNA extraction, increasing efficiency and reducing sample processing time.
- User-Friendly and Resource-Efficient:** Simplified protocols and minimal prep make the technology accessible for smallholder farmers and resource-limited labs.

Commodities
Livestock

Sustainable Development Goals

- 2 ZERO HUNGER
- 3 GOOD HEALTH AND WELL-BEING
- 11 SUSTAINABLE CITIES AND COMMUNITIES
- 12 RESPONSIBLE CONSUMPTION AND PRODUCTION

Categories
Production, Equipment, Pest control



Target groups
Breeders, Veterinary Laboratories, Researcher center

Key points to design your program

Thermo Fisher's Animal Health Diagnostic Technology for Africa

Thermo Fisher's diagnostic technology offers rapid and accurate disease detection, improving livestock health and farm productivity. Tools like Real-Time PCR Diagnostic Kits and VetMAX Master Mixes help prevent outbreaks and safeguard income by enabling early disease detection.

This technology supports **SDG 3** (improving health), **SDG 2** (promoting food security) and SDG 11. It complements other agricultural innovations, making it an ideal solution for development programs focused on animal health, rural livelihoods, and sustainable agriculture. Partnerships with local clinics and agencies ensure successful implementation and support.

Cost: \$\$\$ **15 USD per sample**
For routine testing

150,000 USD
Installation of a qPCR workflow for extraction to result

