

Offering Prizes to Stimulate Foot and Mouth Disease Control in Eastern Africa

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A Dual Threat to Trade and Animal Health

As one of the most infectious livestock diseases in the world, Foot and Mouth Disease (FMD) presents a constant global threat to animal trade and national economies. Endemic throughout Eastern Africa, FMD can devastate livestock productivity and severely compromise small-scale farmers' livelihoods and food security. Vaccination is proven to effectively control FMD, but current vaccines do not offer effective protection against all the strains circulating in the region.

Leveraging Innovation and Investments from the Private Sector

The AgResults Foot and Mouth Disease Vaccine Challenge Project is an eight-year, USD\$17.34 million Pay-for-Results prize competition that supports the development, registration, and uptake of high-quality FMD vaccines that are tailored to meet the needs of Eastern Africa. Managed by GALVmed, the competition focuses on Burundi, Ethiopia, Kenya, Rwanda, Tanzania, and Uganda. The prize is structured as a cost-share that reduces the cost-per-dose for buyers, enabling public and private sector actors to better combat FMD through access to more effective vaccines. In this way, the project encourages the widespread use of prophylactic vaccination to improve animal health and farmer livelihoods. The competition launched in February 2020 and will conclude in July 2028.

Project Objectives

-  Develop and register high-quality FMD vaccines tailored to the needs of Eastern Africa
-  Create greater market stability and affordability through increased production and purchase of FMD vaccines that are regionally relevant
-  Build a private sector model for FMD vaccine purchase and distribution to complement public sector efforts



Anticipated Impact

-  Incentivize manufacturers to support long-term efforts to control FMD in the Eastern African market with regionally appropriate vaccines
-  Increase access to and uptake of effective FMD vaccines
-  Reduce FMD-driven production losses for small-scale farmers in the region (estimated USD\$2.3 billion per year across sub-Saharan Africa)

Project Phases

Development Phase – In this phase, participating manufacturers work to develop an FMD vaccine that meets the following eligibility criteria:

- **Vaccine Development to Target Product Profile (TPP) Standards:** To ensure regional relevance, the quadrivalent vaccine must have a potency of at least 6PD50 and contain serotypes A, O, SAT1, and SAT2 that match current circulating Eastern African FMD Viruses (FMDV).
- **Vaccine Registration:** The manufacturer must achieve full registration in at least one target country.
- **Vaccine Approval:** AgResults FMD Judging Panel must approve vaccines for competition entry that meet the competition's TPP and registration requirements.

Vaccine Distribution Cost-Share Phase – In this phase, the project uses a cost-share mechanism to drive uptake and distribution of high-quality FMD vaccines:

- **Timeline:** The Vaccine Distribution Cost-Share Phase, structured in three sales periods, runs from October 2024 to July 2028.
- **Target Volumes:** A total of 12.5 million vaccine doses will be eligible for the cost-share benefit, spread across the three sales periods.
- **Funding:** The cost-share support available to vaccine buyers through the competition is USD\$15.8 million and is paid directly to vaccine manufacturers to offset the cost of a target volume of vaccines. AgResults funds a percentage of the vaccine price each sales period (e.g. 75% in the first sales period) up to a sale price of USD\$2.00 per dose. If the vaccine has a sale price above USD\$2.00, the buyer pays the difference.
- To support the creation of a sustainable FMD vaccine market in the region, the level of cost-share support gradually decreases each sales period in anticipation of the Project’s completion.



How the Competition Will Address Current FMD Vaccine Procurement Challenges

Challenge	Mitigation
Complex disease with many different strains and currently no suitable vaccine that addresses all regional threats.	→ Vaccines approved by AgResults are quadrivalent, covering the relevant strains found within the four major FMDV serotypes in the region.
No standard for validation of vaccines to ascertain efficacy and relevance to the circulating FMDV field strains.	→ Approved vaccines must demonstrate efficacy against currently circulating FMDV strains via testing against the Eastern African FMDV Reference Antigen Panel, developed by the World Reference Laboratory for FMD (Pirbright, UK). www.wrlfmd.org/
Budget constraints for FMD vaccine purchase.	→ AgResults contributes to the purchase price of approved vaccines during the Cost-Share Phase to offset the price to customers.

About AgResults

AgResults is a USD\$152 million collaborative initiative between the governments of Australia, Canada, the United Kingdom, the United States, and the Bill & Melinda Gates Foundation to incentivize the private sector to overcome market barriers and develop solutions to food security and agricultural challenges that disproportionately affect people living in poverty. The initiative designs and implements agriculture-focused prize competitions, also referred to as Pay-for-Results or pull mechanisms, which are innovative development finance programs that incentivize the private sector to work towards a defined goal to receive a monetary award.

i For more information about the AgResults FMD Vaccine Challenge Project, please email fmdchallenge@galvmed.org or visit the project website: <https://www.galvmed.org/foot-and-mouth-project/>