

Public Private Partnership: the SSAFFE initiative (Safe Supply of Affordable Food Everywhere)

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A statue of a young boy leading a blind man graces both the lobby of the World Bank headquarters in Washington DC and the entrance to the World Health Organization in Geneva Switzerland. The statue evokes a visceral response but few know the history behind it, the story of a successful public-private partnership between the pharmaceutical company Merck, the World Bank, World Health Organization, other UN Agencies and NGOs, national and local health departments. Together this partnership has reduced the impact of river blindness (onchocerciasis) across much of Africa, the Middle East and Latin America. While this collaboration has been hailed as “one of the great public health success stories,” and “the benchmark for all other disease prevention efforts in the developing world,” successful public-private partnerships often escape widespread notice.

Conversely, headline news often highlights stories of public-private partnerships by raising societal questions such as conflict of interest or failure to meet expectations. Joint ventures for vaccine development, antiviral drug production or emergency preparedness stockpiles are prime media targets, especially when the anticipated disease outbreak or natural catastrophe fails to materialize.

While public-private partnerships are not new, their potential role in agricultural health, public health and sustainable development is rarely discussed. Legal, ethical and political issues cloud the public debate, even when substantial potential exists for these partnerships to help us more effectively manage the increasingly challenging dilemmas where agriculture, environment and public health interact with civil society and global interdependencies.

Lessons learned

Public-private partnerships have been created by local and national governments and intergovernmental agencies working with private partners around the world. Private partners include non-profit, non-governmental organizations like Universities or the Red Cross/Red Crescent as well as for-profit corporations. Partnership scope ranges from local to global, with two partners to more than twenty. Partnerships may tackle discreet events like a natural disaster or much broader issues like global malnutrition.

Another example of a successful global public-private partnership is the Flour Fortification Initiative (FFI). FFI involves a network of public and private organizations working together to add micronutrients to flour as part of a solution to vitamin and mineral deficiency around the world. Their goal is to achieve iron

and folic acid fortification of 70% of the roller mill wheat flour by 2008 (www.sph.emory.edu/wheatflour).

Public-private partnerships focus on shared interests. Underlying successful partnerships is a sincere belief that the shared initiative is mutually beneficial. Increasingly, public-private partnerships focusing on public health also discuss the importance of public health to sustainability and the economic development and stability of countries. Several lessons can be drawn from past experiences:

- Successful public-private partnerships require clear identification of roles, responsibilities and reporting
- Partnerships mean the sharing of resources and expertise to achieve results greater than that which could be achieved by acting independently. Charitable donations alone do not constitute public-private partnerships.
- No single organizational model fits all opportunities for public-private partnerships; some are very formal with extensive business plans and legal boundaries while others are more organic, growing from leadership consensus or inter-organizational memoranda of agreement
- Public-private partnerships must be able to adapt to constantly changing societal needs and expectations as well as politics, global events and personalities
- Public-private partnerships face public scrutiny as they often bring together entities with very different missions and mandates

Increasing needs for public-private partnerships

The last decade has seen a series of agricultural and public health catastrophes with global impacts: recognition of bovine spongiform encephalopathy (BSE) as a zoonosis (a disease affecting both animals and people); the terrorist attacks of September 11, 2001; H5N1 highly pathogenic avian influenza and melamine contamination of wheat gluten. These events heightened awareness of the vulnerability and fragility of the global food system for both origination and destination countries. Disease and terrorist events have dramatically changed global supply chains, with direct impacts on national economies and development:

- BSE disrupted the beef industries of the United Kingdom, Europe, Japan, Canada and finally the US, a problem intensified by the segmentation and specialization of trade whereby individual animal parts no longer in demand in the origination country find strong markets elsewhere and come to represent a value proposition for processors and a significant protein source for destination countries
- 9/11/2001 added new layers of security requirements including new identity requirements and supply chain traceability. The regulatory burden in many developed countries of moving both people and products has increased along with new mandates for background checks and tamper-proof packaging and effectively excluded some developing economies from participation in global trade

- H5N1 showed how consumer preferences and political expediency can disrupt trade despite overwhelming scientific evidence of effective risk management. Entire countries were labeled as 'risky' and their trade in low risk products such as cooked poultry meat blocked due to public angst and political posturing in the face of outbreaks and confusion between bird flu and pandemic influenza.
- Economic adulteration (melamine) demonstrated the combined effects of global sourcing of raw materials and the widespread practice of co-branding and contract production. The intentional adulteration of wheat flour subsequently mislabeled as wheat gluten, a feed ingredient, by a few manufacturers ultimately affected more than a hundred brands of pet food and found its way into food-producing animal feed in many countries.

Concurrently, disparities in veterinary and public health infrastructure set the stage for intense frustration as international standards for the safe trade in animals, plants and food products fail to be recognized and implemented. Surveillance systems vary by country, limiting the potential for data integration and global intelligence. Laboratory instrumentation and diagnostic expertise differ dramatically, with industrialized countries expecting testing and results far beyond the capabilities of many origination countries. New approaches such as risk analysis and compartmentalization find widely divergent levels of adoption in part because of disparities in the human resource capacity and political will of national governments.

Finally, an increasing number of development agencies and international organizations recognize that investments in agricultural health often lack strategic planning and organizational commitment. In order to attract food industry investment, development must be sustained to demonstrate a commitment to enhancing capacity and to provide a positive climate for economic development. Without sustainable development and a positive climate for private investment, food security suffers, denying affordable and safe food to people in many parts of the world.

Origin of the SSAFE initiative

The SSAFE initiative developed out of a growing recognition of vulnerabilities and fragility of global food systems. Safe Supply of Affordable Food Everywhere (SSAFE) represents a partnership between global food system companies, international NGOs, intergovernmental organizations and academia. The SSAFE initiative began with a small group of global food system company executives and academics visiting the Paris headquarters of the World Organization for Animal Health (OIE) early in 2005. Discussions of the role of the OIE illuminated shared interests between OIE and the global food companies in promulgation of scientifically-sound international standards for safe trade in animals and animal products and in adequate official government capacity to deliver core functions of

surveillance, risk analysis, emergency preparedness and response as well as active participation in the global standard setting activities.

These discussions set the stage for an exploratory meeting that was held in conjunction with the World Veterinary Congress in July, 2005. Representatives from about a dozen global food system companies joined the OIE Director General and representatives from the OIE Administrative and Code Commissions along with academic leaders from the University of Minnesota and Michigan State University. Presentations on the role of the OIE and discussions of the potential for public-private partnerships led to a series of organizational meetings through the late summer and early fall of 2005. SSAFE identified a strategy for achieving its vision through:

- Leveraging resources through Public-Private-Partnerships for collective action
- Providing safe harbor for a trusting and respectful environment to share ideas and stimulate discussion
- Facilitating and enabling progress at the local and international level to strengthen the global food safety system

These discussions not only hammered out organizational issues but also identified strategic opportunities for enhanced engagement with global H5N1 HPAI activities. A SSAFE representative was invited to attend the global H5N1 HPAI and pandemic influenza strategy-setting meeting in Geneva in November 2005. SSAFE and the OIE arranged a larger meeting of industry leaders in Paris later in the same week and invited World Bank participation. Presentations on the global H5N1 situation were followed by animated discussion of the potential for public private partnership contributions. Out of these discussions emerged a strong theme of sustainability, that investment in national capacity-building and global surveillance and response systems must be sustainable beyond the immediate issues. These discussions cemented the commitment of a core group of global food system companies, international NGOs and academia for development of the SSAFE concept.

The Geneva influenza strategy session also stimulated discussions with the Food and Agricultural Organization (FAO) and David Nabarro, the UN system coordinator for avian and pandemic influenza. Just as had happened in the initial visit with OIE, shared interests quickly became apparent. Discussions focused on what actions might realistically take place in the short term in line with the OIE/WHO/FAO agreement that the highest priority was to address H5N1 avian influenza at its source in Southeast Asia. Meetings were organized in Minneapolis Minnesota and Bangkok Thailand in December 2005 to further these discussions and planning. Out of this series of meetings grew a sense of urgency and a commitment for collaboration.

Actions taken by SSAFE

Collaborative educational and awareness-raising activities were implemented in southeast Asia in late 2005 and early 2006 as a result of SSAFE catalyzed public-private partnerships:

- McDonalds, Keystone Foods and Cargill contributed resources to Care International to support grass-roots educational campaigns in Vietnam that stressed practical biosecurity and personal hygiene
- Cargill partnered with FAO to translate educational materials into Mandarin and disseminate these through their employees in China. Thousands of brochures and posters were distributed to employees to take back to their hometowns, villages and families
- Sun Valley Thailand supported the Thai government in upgrading laboratory capacity and influenza surveillance systems by loaning PCR equipment to the Ministry of Agriculture and Cooperatives' Department of Livestock Development and training laboratory personnel in their use
- Sun Valley Thailand also launched "big cleanup" campaigns in villages surrounding their production and processing facilities to stress biosecurity and disease prevention. These campaigns now have become a regular part of these communities
- Cargill Animal Nutrition launched a series of community meetings across Vietnam to discuss avian influenza and biosecurity strategies

Simultaneously, the SSAFE coalition tackled a food standards issue that vexed trading partners and the food system industries alike, the lack of an international standard regarding appropriate time and temperature treatments to support safe movement of eggs and egg products. Despite existing scientific research and a proposed draft, no decision had been raised and the issue appeared unlikely to be considered in the 2006 annual meeting of all of the chief veterinary officials of the 167 OIE member countries. With no international standard, a range of import requirements existed for different countries. While the World Trade Organization agreements provide legal authority to the international standards created by the three sisters, OIE, IPPC and CODEX, in the absence of standards, no scientifically-sound, internationally agreed upon benchmark exists for setting import requirements. What was considered "safe" for one country was unacceptable for another, restricting trade and the movement of cooked poultry and pasteurized egg products.

Given their new understanding of the organization and operations of OIE, SSAFE member companies worked with government officials in the countries where they operated to share the most recent scientific findings and discuss the draft standard. At the encouragement of SSAFE members, several Chief Veterinary Officers asked for the draft to be considered by OIE. The new standard was passed by the OIE in May 2006.

Another role for SSAFE also surfaced – presentations at industry and professional meetings and sponsorship of symposia or sessions at national and

international meetings. Discussions of the role of public-private partnerships sponsored by SSAFE included the National Institute for Animal Agriculture meeting in the spring of 2006 and the United States Animal Health Association in the fall of 2006. The opportunities afforded by public-private partnerships were presented at an ASEAN meeting in the Philippines and the Food Safety Summit in Washington, DC early in 2007. Public-private partnerships were also discussed at a special session on “One Medicine” at the American Veterinary Medical Association in July 2007, the European Food Safety Summit in Prague and the European College of Veterinary Public Health, both in September 2007.

Impact and implications of SSAFE

The SSAFE initiative has raised awareness in the animal and public health arenas of the opportunities for public-private partnerships (PPP) to contribute to the global food safety system in order to achieve food security, the availability of adequate nourishment for all. SSAFE activities have increased engagement of global food system companies and academics with national governments and with intergovernmental organizations. The collaborations growing out of this engagement has fostered trust and credibility where previous relationships often were adversarial. Through the ensuing partnerships, resources have been leveraged around shared interests such as strengthening poultry biosecurity in Southeast Asia. These growing partnerships are catalyzing new activities in 2007

- SSAFE partnership with the Wildlife Conservation Society in hosting “One World, One Health” conferences. Government officials from agricultural, environmental and public health along with industry leaders joined academics and NGO representatives to discuss emerging challenges involving domestic animals, wildlife, humans and the environment. The meetings, most recently in China and Brazil, expanded networks, bringing together regulators, scientists and interest groups around shared interests in animal health, public health and the environment. The overall goal of the “One World, One Health” initiative is to establish a more holistic approach to preventing epidemic/epizootic disease and for maintaining ecosystem integrity for the benefit of humans, their domesticated animals, and the foundational biodiversity that supports us all (<http://www.oneworldonehealth.org/>).
- Capacity-building support for Mozambique: At the request of the chief veterinary officer of Mozambique, SSAFE brought together a team comprising food industry, academia, and an international NGO, Technoserve, to assist Mozambique as it strengthens its veterinary public health services in a resource-efficient manner. Strengthening of animal health services will enhance the nation’s long-term food security, as well as benefit public health and improve food safety. This project will identify opportunities for the public and private sectors to advance together. An initial evaluation showed the need to evaluate the current socioeconomic value of animal agriculture, showcase and

expand the community vaccination programs, establish a public-private animal health leadership team, integrate family sector animal health programs with the commercial sector, and raise awareness on the importance of animal health.

- Global food safety system leadership initiative: SSAFE providing the initial funding to catalyze development of an international consortium of universities working together to train global food safety system leadership. Recognizing that leadership often is the missing ingredient for making progress, the initiative has funded an endowed university chair at the University of Minnesota and committed operational funds for seven years to jump-start the initiative as the first step toward developing an international consortium of universities committed to global food safety system leadership. Leaders in food safety, public health and veterinary medicine from academic institutions in Europe, South America, Asia and Africa will create a virtual team to host leadership development activities around the world. Developmental assignments in government, industry and non-governmental organizations will complement leadership training activities to create a new generation of global food safety system leaders committed to sound science and harmonized policies across the global food supply chain.

SSAFE growth and development

Creating public-private partnerships often is viewed with skepticism or at best cautious optimism by government agencies and industry alike. SSAFE began with a small number of companies, NGOs and universities willing to take a risk at forging a productive partnership with intergovernmental organizations like OIE, the World Bank and FAO to address global food systems safety. While SSAFE began under the auspices of the University of Minnesota Center for Animal Health and Food Safety, the organization was incorporated in August 2006 and received independent non-profit status as a charitable organization. SSAFE current has 14 active participants comprising global food system companies (Cargill, Cobb-Vantress, Ecolab, Keystone, McDonalds, Nestlé Petcare, Pfizer, and Yum! Brands), international non-governmental organizations (Wildlife Conservation Society, Center for Science in the Public Interest, International Federation for Animal Health) and the University of Minnesota as well the World Organization for Animal Health and the Food (OIE) and the Food and Agricultural Organization of the United Nations (FAO).

To achieve its ultimate goal, SSAFE must bring together additional partners in order to achieve a truly global partnership. In addition SSAFE activities must extend beyond issue-based initiatives that stimulate awareness or address immediate needs only. To achieve the lofty goal of a safe supply of affordable food everywhere will require a broader portfolio of activities with both short and long term horizons.

Summary

The SSAFE initiative represents a public-private partnership focused on global food security. SSAFE brings global food system companies, non-governmental organizations, and universities together with intergovernmental organizations like OIE and FAO. Responding to H5N1 highly pathogenic avian influenza, SSAFE sponsored educational and awareness-raising activities promoting biosecurity and safe food handling practices. SSAFE activities are expanding with commitments to far-reaching projects including the “One World, One Health” initiative, veterinary and public health capacity-building in Mozambique and global food safety system leadership development through an international consortium of universities. Building on lessons learned from successful international public-private partnerships of the past, the SSAFE vision is that “[All people will have access to safe, nutritious, and affordable food](#)”. The productive partnership with the World Organization for Animal Health, the World Bank, and the Food and Agricultural Organization represent an integral component of the SSAFE strategy. Public-private partnerships are critical for addressing global animal health issues.