The Safe Food Imperative

Towards Smarter Investment and Regulatory Delivery

STEVEN JAFFEE, WORLD BANK

SPENCER HENSON, UNIVERSITY OF GUELPH

STDF WORKING GROUP

GENEVA, OCTOBER 30, 2018

WORLD BANK GROUP

Main Messages

- **Food safety is a mainstream economic development issue but generally has not been recognized as such**. When food safety has been on the development agenda this has primarily been in relation to trade. This needs to change.

- **In relation to domestic food safety, we often see a policy vacuum, leadership void, and pattern of underinvestment**. Concerted public action is normally reactive rather than preventative. Crisis management is more common than risk management.

- **The gap between food safety capacity and actual needs is especially problematic among rapidly urbanizing lower middle income countries**. For these countries, a 'business as usual' approach will result in large future public health and economic costs.

- There are appropriate food safety public policies and cost-effective investments for countries at all economic levels. Yet, there is a **need for smarter investment and a paradigm shift in food safety governance and stakeholder engagement**.

Food safety is a mainstream economic development issue

TRADITIONAL IMAGE OF FOOD SAFETY

FOOD SAFETY CRITICAL TO ACHIEVING THE SDGS

Food safety is integral to:

Food safety (practice) contributes to:

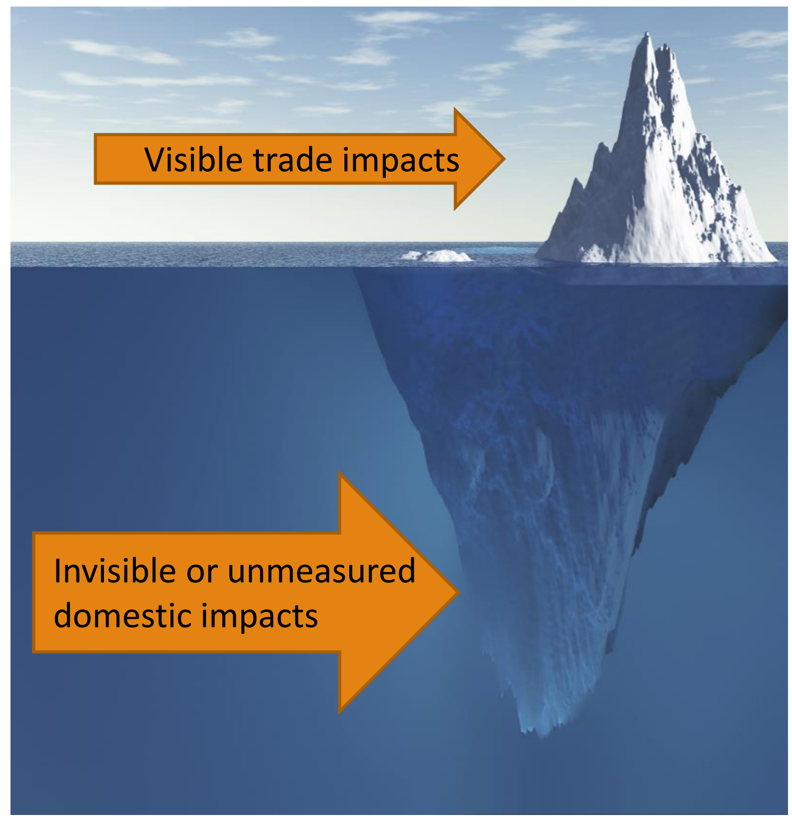
The lack of explicit attention to food safety in the SDGs stems from the low evidence base on the burden of foodborne disease and the overall low awareness of development practitioners about the economic significance of unsafe food.

Most attention and resources for food safety has focused on trade

Major Market Access Concerns

- Standards as non-tariff barriers?
- Private standards = smallholder exclusion?
- Standards compliance costs
- Harmonization & equivalence

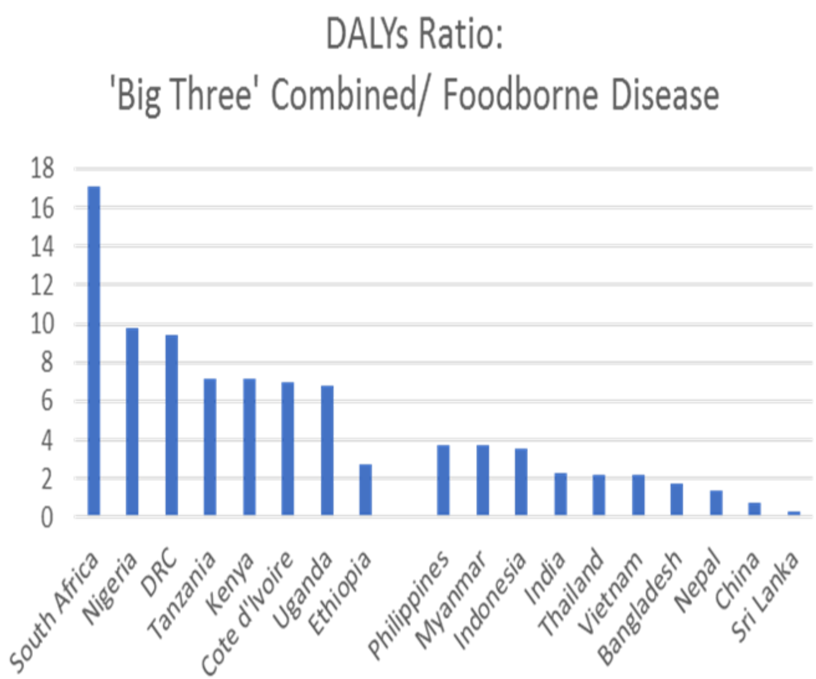
Trade	Domestic
Well organized stakeholders	Non-organized consumers
Clear public SPS roles	Fragmented food control mandates
Costs incurred by lead firms & farmers	FBD burden falls heavily on the poor



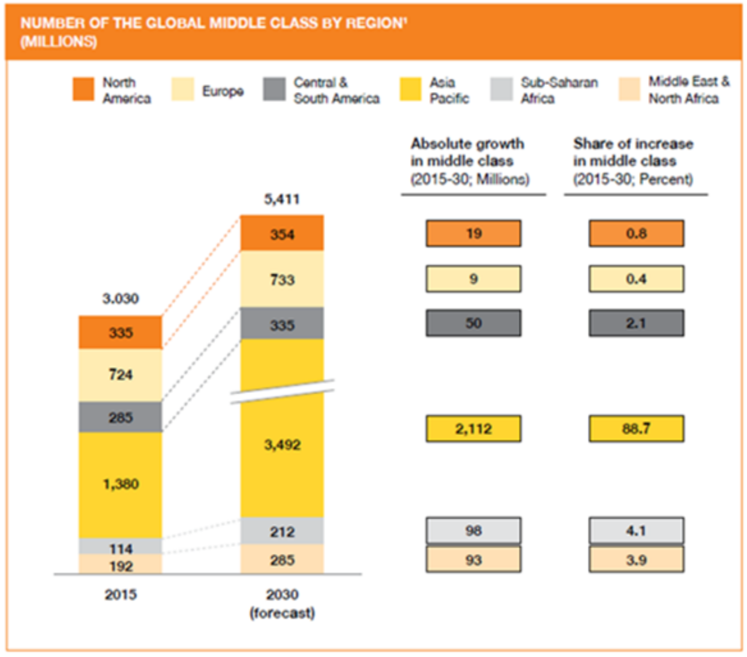
Why has domestic food safety emerged as a more prominent issue in Asia than in sub-Saharan Africa?

Differential perceptions about the problem & opportunity

PUBLIC HEALTH RESOURCE COMPETITION



MIDDLE CLASS CONSUMER OPPORTUNITY



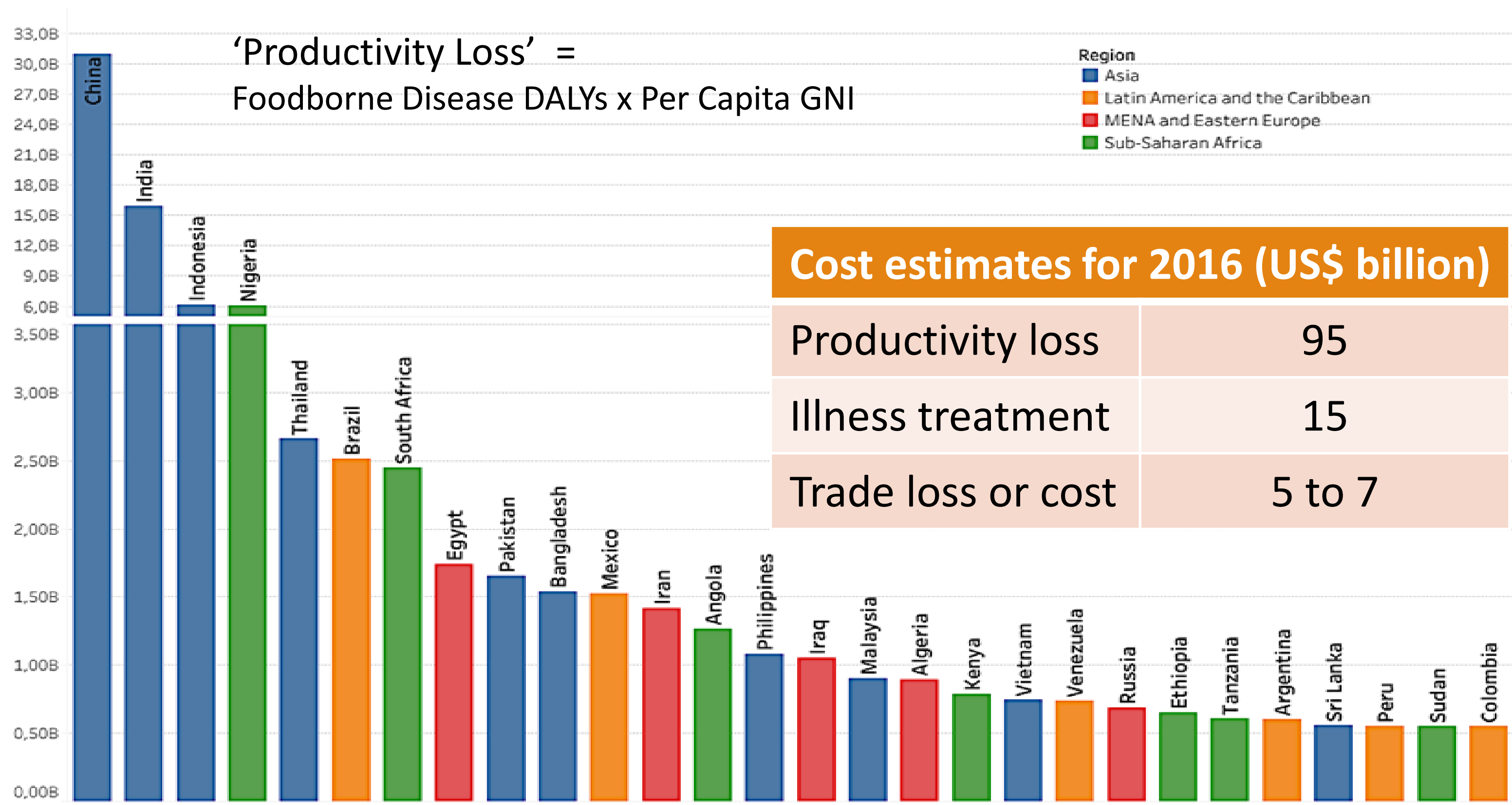
1 The income range for middle-class families is defined by Brookings as ranging from $11 to $110 income per day in 2011 Purchasing Power Parity (PPP) terms.
SOURCE: Homi Kharas (Brookings Institute); Team analysis

ASIA WILL ACCOUNT FOR NEARLY 90% OF THE GROWTH OF THE GLOBAL MIDDLE CLASS TO 2030

Economic costs of unsafe food can take many forms with both short and long-term dimensions

	Types of Costs
Consumers	Cost of illness and treatment; food avoidance or substitution; higher prices
Farm, firm or Industry	Loss of sales & brand equity; lower prices; fines; costs of mitigation; consignment rejections
Food Sector	Limit market expansion; reduce speed of dietary transition; lose market share to imports;
Economy	Loss of labor productivity; public health costs; harm to tourism reputation and earnings; reduced competitiveness and trade revenue

Public health and domestic economic costs of unsafe food may be 20 times the trade-related costs for developing countries



Cost estimates for 2016 (US$ billion)	
Productivity loss	95
Illness treatment	15
Trade loss or cost	5 to 7

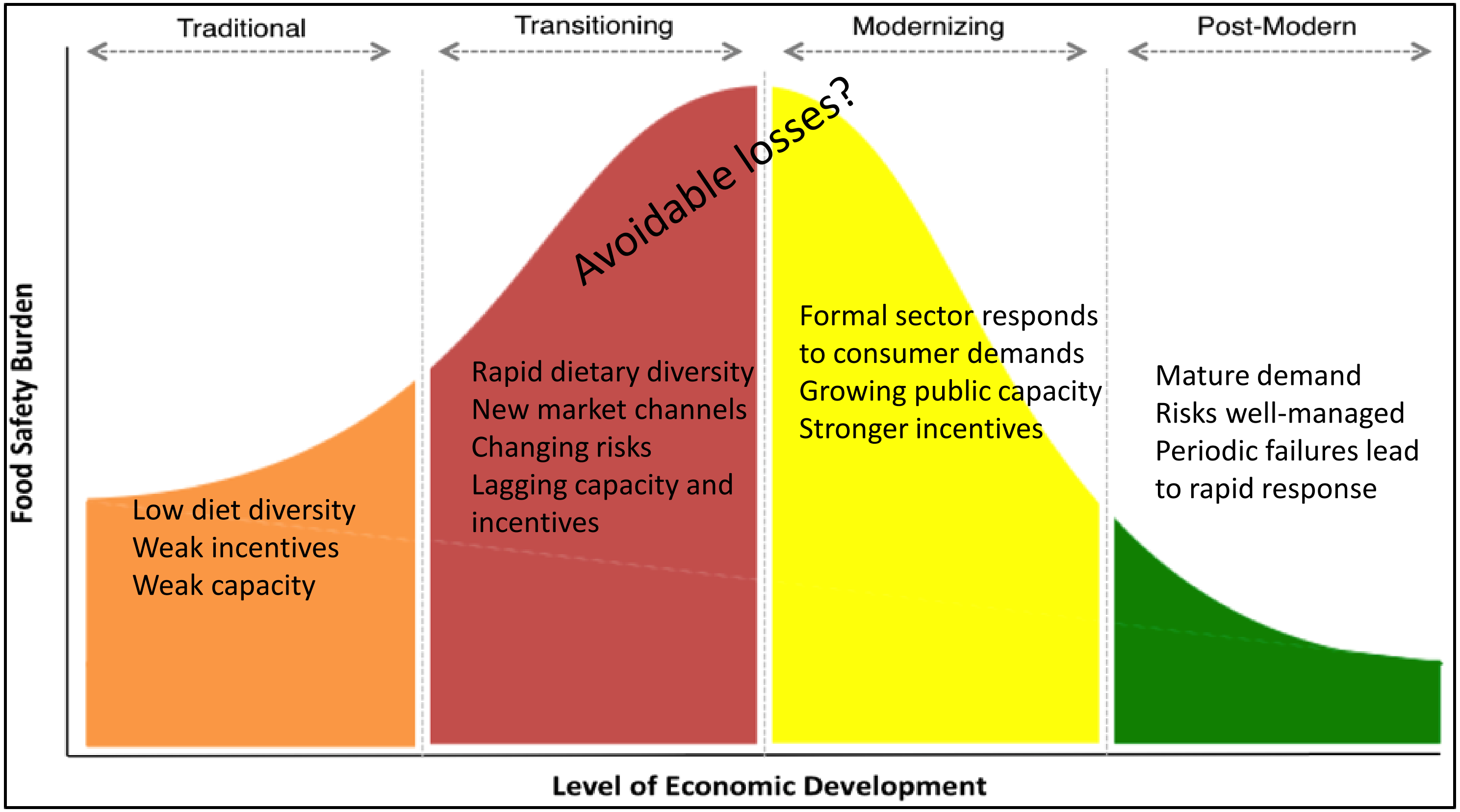
Based on WHO/FERG & WDI Indicators Database

Illness treatment =
US$27 x # of Estimated foodborne illnesses

Trade loss or costs =
2% of developing country **high value** food exports

The Food Safety Lifecycle

The economic burden of unsafe food is systematically linked to the processes of economic development and dietary transformation

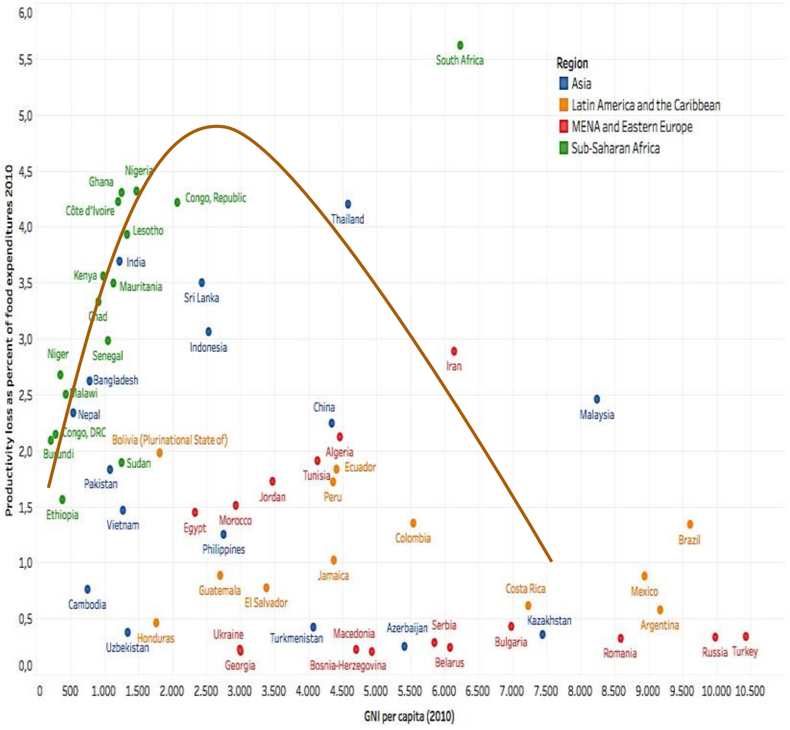


Reflects the relationship or gap between food safety needs and actual capabilities and incentives

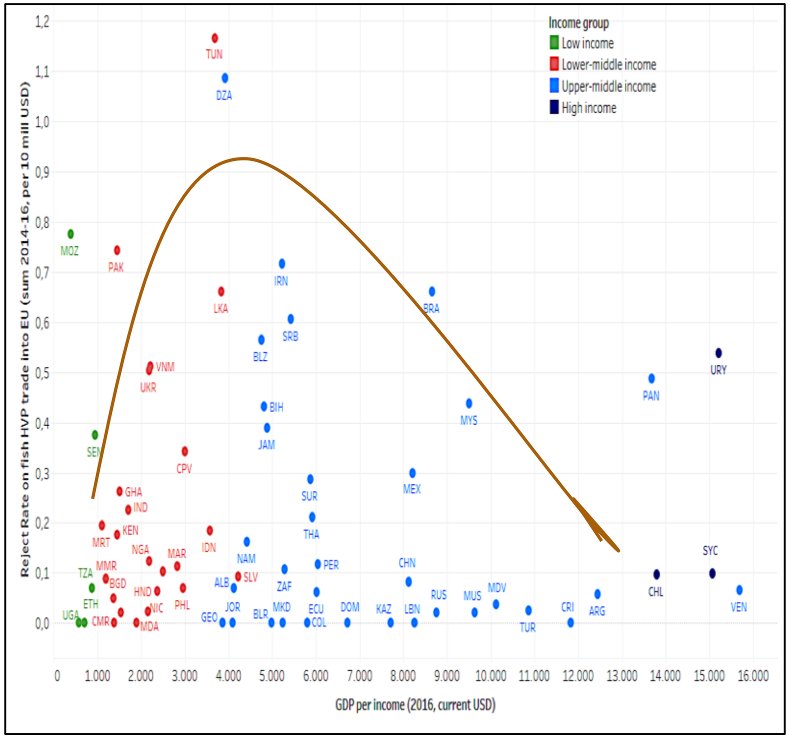
Today's lower middle income countries represent the world's food safety 'hotspot'

Wide diversity in food safety performance yet consistent with the inverted U “lifecycle” concept

PRODUCTIVITY LOSS AS PERCENT OF FOOD EXPENDITURE (2010)



REJECTION RATES FOR FISH IMPORTS INTO THE EU (2014-16)



While we lack objective measures for many dimensions of food safety capacity, qualitative food control assessments in many low and middle income countries point to common shortcomings

Policy and rules

- No comprehensive national policy >>>> lack of prioritization
- Progress on food law; less on regulations to enable its enforcement
- Many standards; lack of clarity on voluntary vs. mandatory nature
- Lack of mechanisms for accreditation/certification of businesses

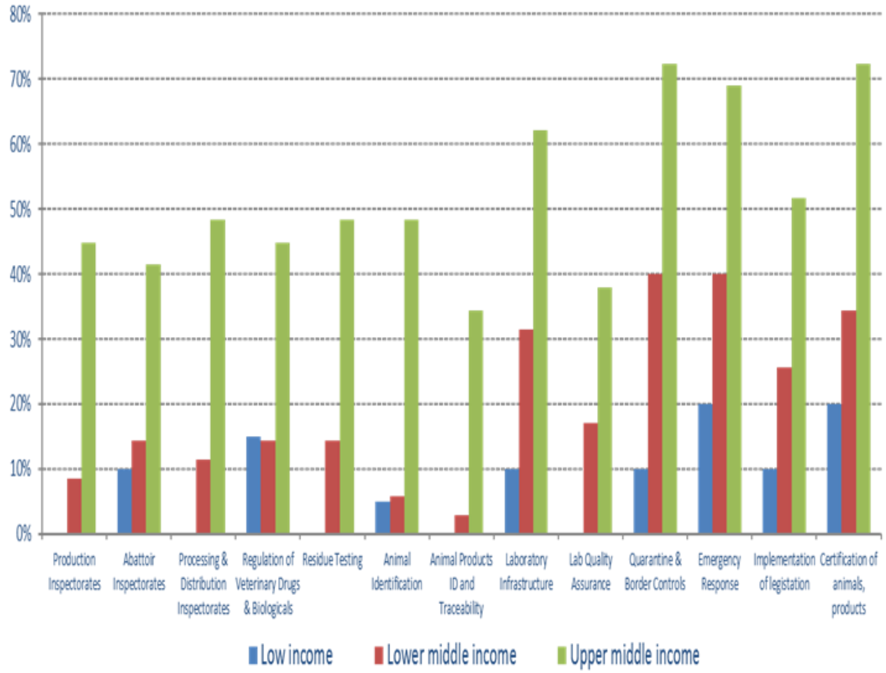
Institutional fragmentation and compartmentalization

- Split of institutional responsibilities; at center and decentralized
- Disconnects between trade & domestic food governance
- No coordination on market surveillance; site/enterprise Inspection is not risk based
- Laboratory testing units not functioning as a cohesive network

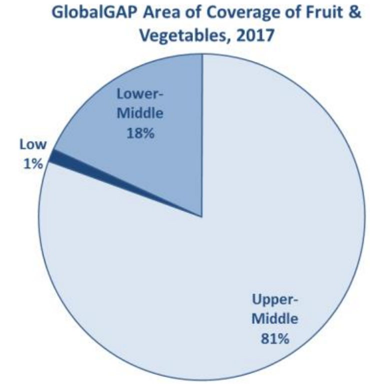
Sources: FAO assessments in multiple countries of South and Southeast Asia, 2015 to 2017

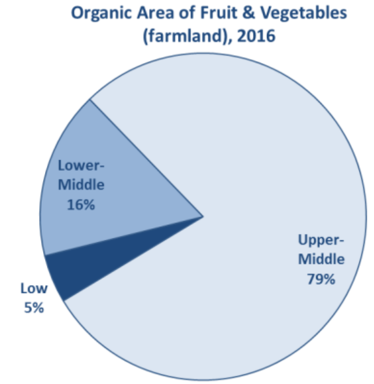
Many low and lower middle income countries have only islands of food safety capacity in government and the private sector. The situation is much better for upper middle income countries

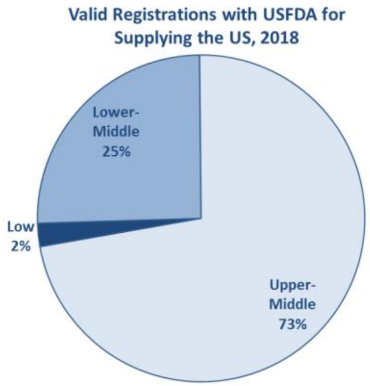
Government capacities related to animal product food safety

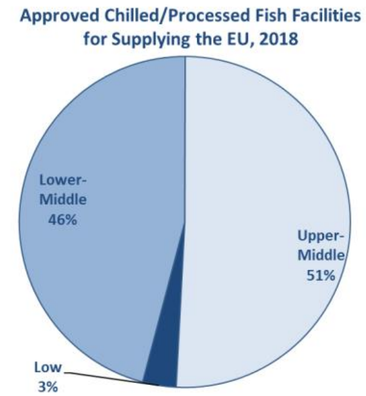


Proportion of countries with adequate capacity: OIE PVS Assessments



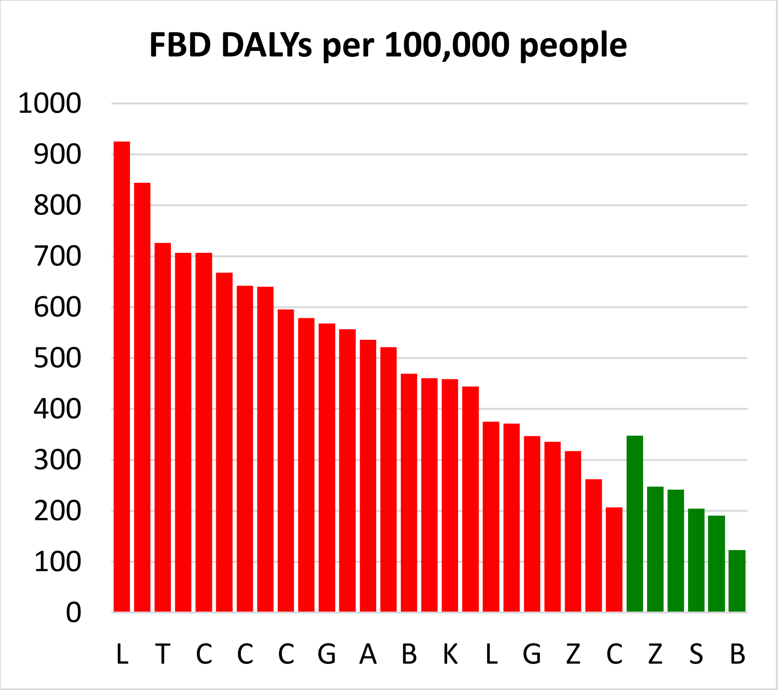






Investment in food safety capacity can yield high returns in domestic markets

FBD DALYS FOR ANIMAL SOURCED FOOD FOR AFRICAN COUNTRIES WITH ADEQUATE AND INADEQUATE VETERINARY SERVICE FUNDING



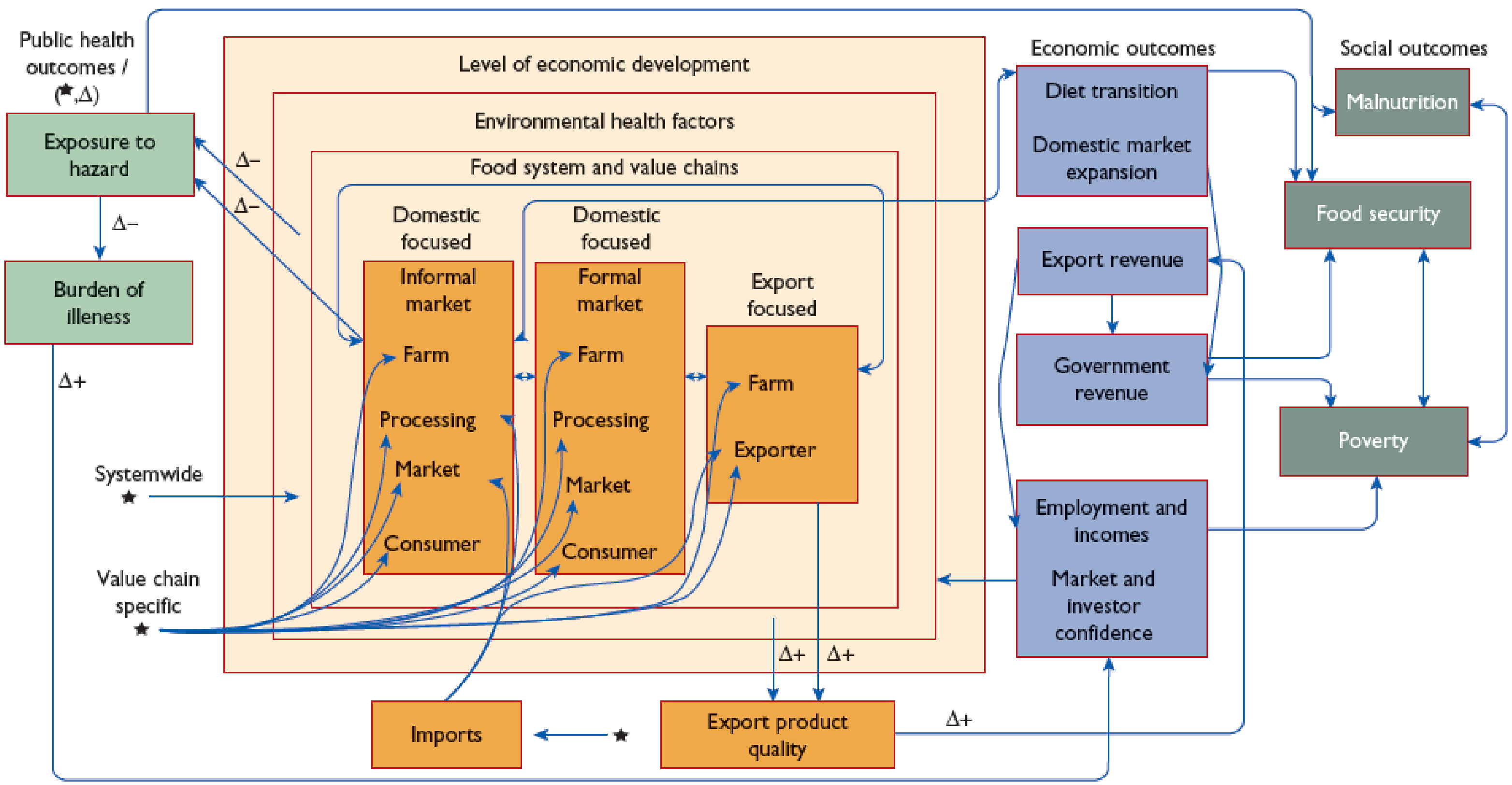
Red vs. Green: inadequate vs. adequate operational funding
Source: OIE PVS Assessments and FERG Researchers

TECHNICAL AND ECONOMIC BENEFITS FROM INTERVENTIONS IN INFORMAL MARKETS

	Kenya Milk	Nigeria Meat	India Milk
Timing	1997-2006	2009-2011	2008-2013
# Trained	3200	500	900
Interventions	Hygiene training; certificates	Hygiene training; materials, collective oversight	Hygiene and business training
Impacts	Reduced incidence of unacceptable coliforms	Reduced incidence of unacceptable meat	Lower disease incidence
Consumers Benefitting	1 million	360,000	1.5 million

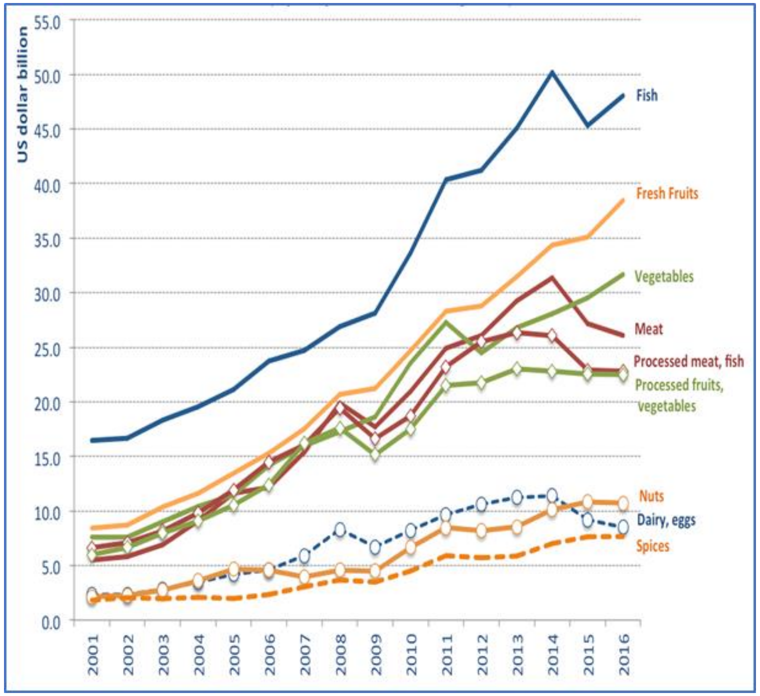
Examples from ILRI-supported initiatives

Impacts of improved food safety capacity are complex and wide-ranging– many such impacts are underestimated or unnoticed



Investment in food safety capacity can yield high returns for exports

LOW AND MIDDLE INCOME COUNTRY HIGH VALUE FOOD EXPORTS

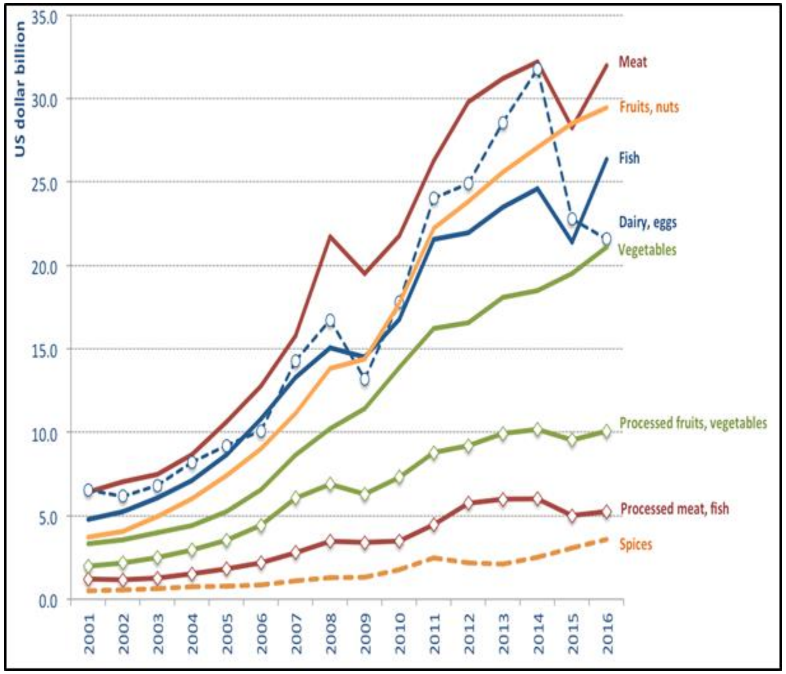


FOOD SAFETY COMPLIANCE CHALLENGES HAVE CATALYZED INVESTMENTS & UPGRADES

- The 10 to 15 countries which dominate food safety capacity expansion also dominate high value food trade
- Declining rejection rates for many leading countries/industries—who otherwise dominate rejections
- Other illustrative examples of high benefit/cost ratios among smaller countries and industries
- But does capacity strengthening for trade have positive spillovers to domestic food safety?

Global patterns of food trade are changing with significant implications for food safety policy

SURGING LOW AND MIDDLE INCOME COUNTRY HIGH VALUE FOOD IMPORTS



SOME TRENDS

- The share of high income countries as both suppliers & recipients of developing country high value foods is declining
- The most rapid growth is in South-South trade, especially for trade involving low and lower middle income countries

Why does this matter for policy, strategy or capacity building efforts?

Dominant middle income importers of high value foods may not be applying consistent and transparent risk-based approaches to food import controls

10 countries account for 2/3 of developing country high value food imports

Food Import Controls: Elements of Good Practice

- Transparency in legislation & operating procedures.
- Institutional roles & responsibilities clearly defined.
- Consistency & impartiality in the application of controls.
- Harmonization with existing standards & guidelines
- Recognition of trading partner food control systems

A Mixed Picture Reality

Level of Burden in Applying Rules and Practices to Govern Agri-food Imports
High Burden=1; Low Burden=5

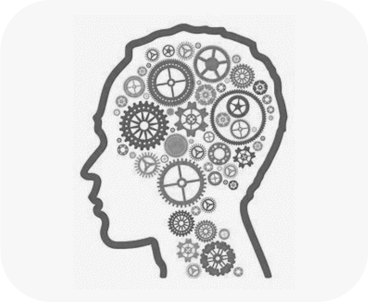
Country	TBT	SPS	Information	Administrative Burdens	Enforcement Consistency	Total
Middle-Income						
Peru	3	3	5	3	3	17
Mexico	4	3	4	2	2	15
Malaysia	2	2	4	3	3	14
Philippines	3	3	2	2	1	11
Vietnam	3	3	2	2	1	11
Thailand	2	2	3	2	1	10
Russia	2	2	2	1	3	10
Papua NG	3	2	2	1	2	10
China	2	2	3	1	1	9
Indonesia	1	1	1	1	1	5
Average	*2.5*	*2.3*	*2.8*	*1.8*	*1.8*	*11.2*
High-Income						
Singapore	5	5	5	5	5	25
New Zealand	5	4	5	5	5	24
Taiwan (ROC)	4	3	5	4	5	21
Japan	3	3	5	4	5	20
Australia	3	3	5	4	5	20
USA	3	3	5	4	4	19
Chile	4	4	3	3	5	19
Canada	3	3	4	4	4	18
S. Korea	3	2	3	3	3	14
Average	*3.7*	*3.3*	*4.4*	*4.0*	*4.6*	*20.0*

Source: APEC Business Council 2016

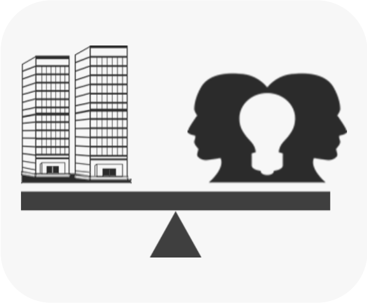
There is a need for more and smarter public investment in (domestic) food safety…

Clear purpose & evidence-based

Foundational knowledge & human resources



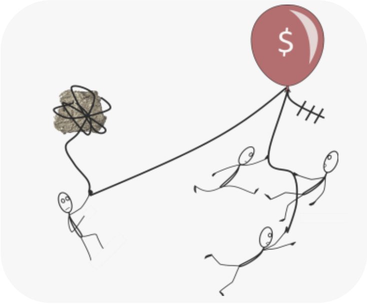
Balance hardware / software



Capture synergies

Monitor Impact

Leverage private investment

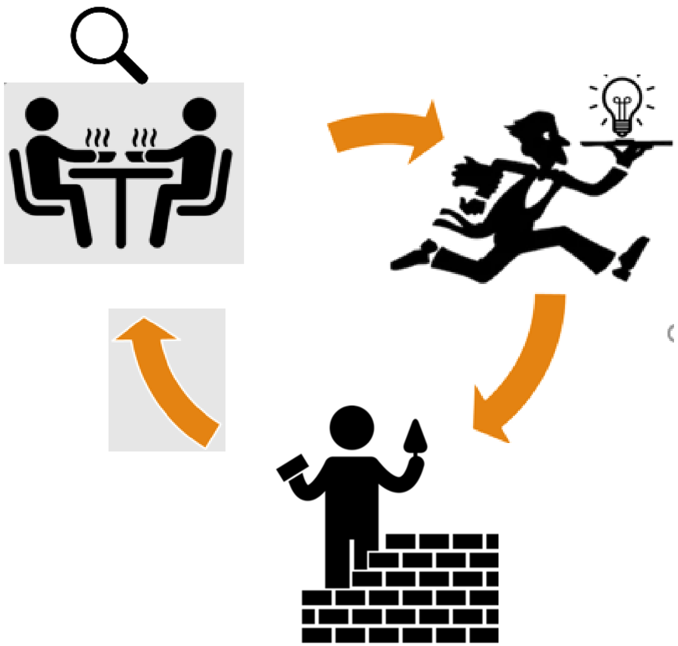


....and improving regulatory delivery

Crisis-driven Authoritarian Approach

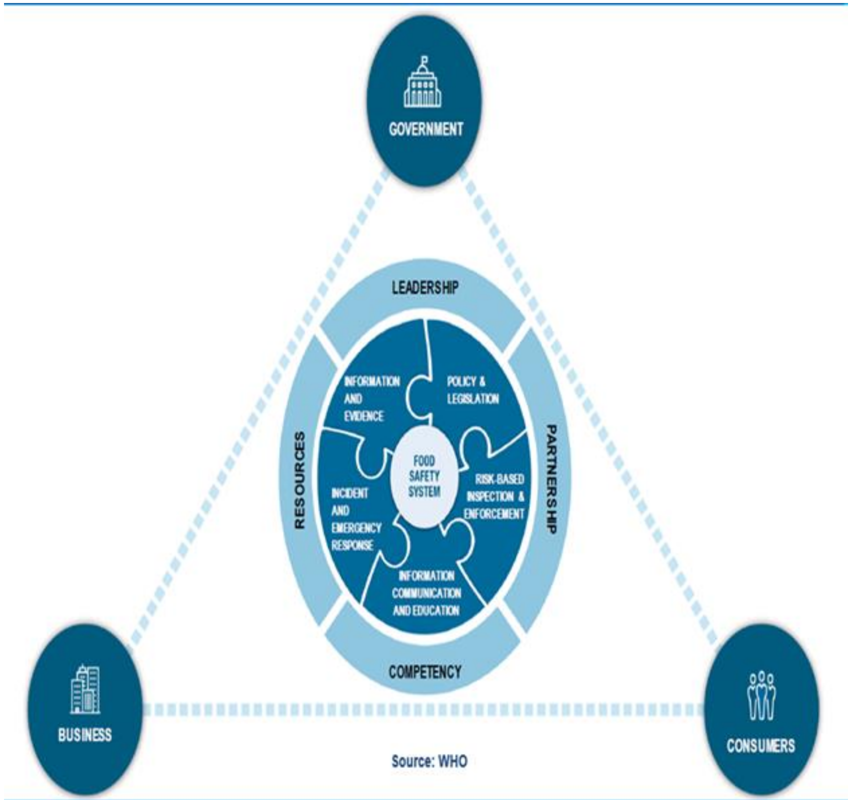
Regulator versus Regulated

Risk-based Facilitating Compliance Approach



Food Safety as Shared Responsibility

In many countries, finding better ways to leverage private initiative and to operationalize the concept of shared responsibility are major challenges



	Private Service or Investment	Possible Policy & Other Constraints
Knowledge	Food science, epidemiological or other research	Restrictions on non-public research or access to public or international research funding
	Professional food safety training + education	Non-accreditation by public agencies. Competition from subsidized public (and donor) programs
	Consumer awareness + education	Conflicts or inconsistencies with public risk communications
Practice & Infrastructure	Build/operate or manage improved wholesale or community markets	Public monopolies; land use restrictions; Absence of public utility services
	Promote safe production practices and technologies among farmers and SME suppliers	Weak enforcement of regulations; restrictions on technology imports; restrictions on private advisory services or direct sourcing from farmers
Compliance Assurance	Commercial laboratory testing services	Competition from subsidized public labs; mandatory public testing; non-accreditation
	Responsibility to monitor industry compliance with regulatory requirements	Government doesn't accept or trade partner doesn't recognize such co-management arrangements

Calls to Action

by stakeholder type

Food Industry and Agricultural Associations

Organize collective action

- Build awareness and facilitate action
- Good practices (ag, manufacturing)
- Advocate for good policy and regulatory delivery

Ministries of Finance

Target public spending

- Calibrate to costs and benefits
- Preventive rather than reactive
- Balanced (hardware/software)

Academic and Research Institutions

Build evidence

- Fund scientific research
- Train professionals
- Carry out risk assessments
- Evaluate interventions

National Food Safety Agencies or Technical Ministries

Unify food strategies

- Evidence-based
- Support compliance
- Leverage private investment
- Empower consumers

Development and International Technical Agencies

Focus more on food safety for domestic health

- Conduct economic analysis and M&E
- Facilitate resource priority processes
- Foster South-South learning
- Benchmark food safety systems
- Address export & import controls

Need for policy leadership!!!

What are the Implications for the STDF?

- More attention to import controls as the ‘forgotten’ aspect of agri-food trade as the importance of imports increases in middle-income countries
- Focus on enhancing the spillover effects of trade-related capacity-building as the segregation of export and domestic market focused value chains diminishes in middle-income countries
- Only invest in capacity-building where there is a concrete financial commitment from national governments and/or the private sector in order to ensure local ownership and sustainability

Thank You

Just Released…..

The Safe Food Imperative:

Accelerating Progress in Low- and Middle-Income Countries

S. Jaffee, S. Henson, L. Unnevehr, Delia Grace and Emilie Cassou

(With multiple collaborators, including Arie Havelaar, Vivian Hoffmann, Donald Macrae, Clare Narrod, Jairo Romero, Shashi Sareen, Mateo Ambrosio, Franck Berthe, and Anissa Collishaw)