

Comparing knowledge, attitude and practice around meat safety in three developing countries (Nigeria, India, Vietnam)



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Outline

- Context
- Methodology
- Results
- Conclusion

Context

1. Demand-driven livestock revolution







		Annual per capita consumption		Total consumption	
	year	Meat (kg)	Milk (kg)	Meat (Mt)	Milk (Mt)
Developing	2002	28	44	137	222
	2050	44	78	326	585
Developed	2002	78	202	102	265
	2050	94	216	126	295

Rosengrant

Context

2. Increasing concern over food safety

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1. Official abattoir stamp present	<p>Clean premises</p> 	<p>Low/marbled fat</p> 	<p>Fresh red meat</p> 	<p>Price ETB/kg 38</p>
2. Official abattoir stamp present	<p>Unclean premises</p> 	<p>High fat meat</p> 	<p>Non-fresh pale meat</p> 	<p>Price ETB/kg 34</p>

Demand for livestock products in developing countries with a focus on quality and safety attributes: Evidence from case studies

In developing countries studied
Many/most concerned over food safety (40 to 97%)

Buy less during animal health scares

WTP 5-10% premium for safety

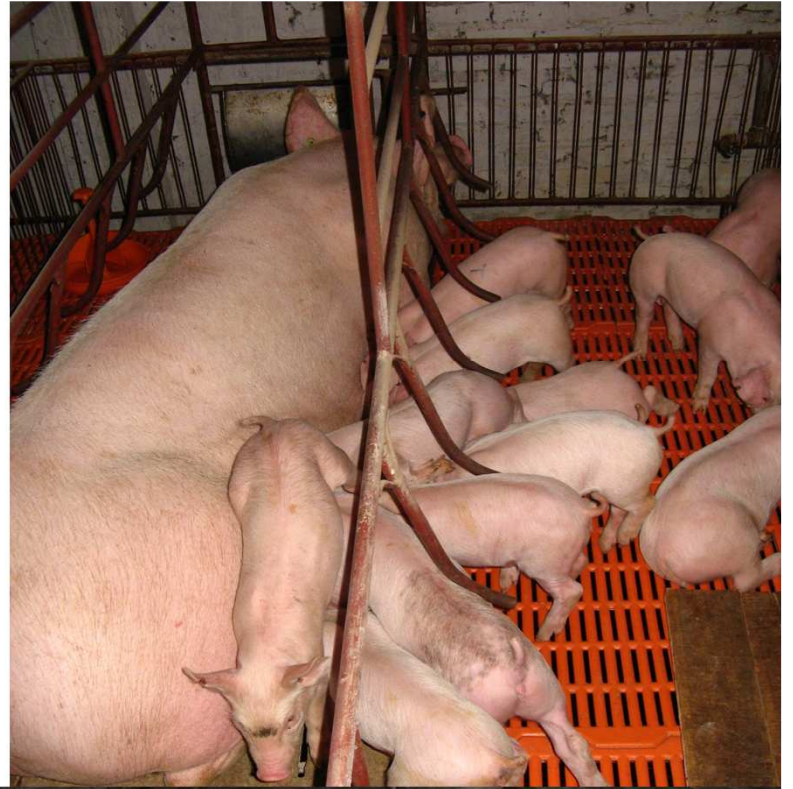
Younger, wealthier, town, supermarket-shoppers willing to pay more for safety

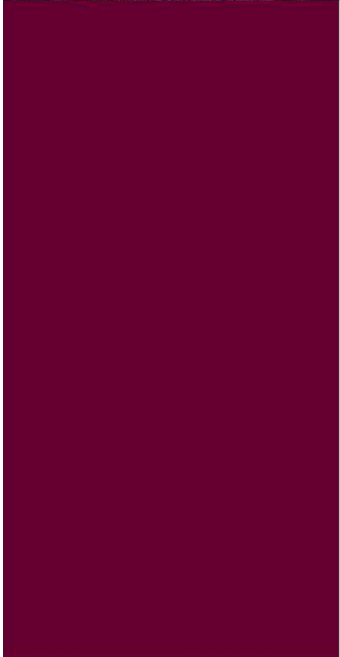
Tool-box for safer food in informal markets

- Risk based approach
 - Risk pathway
 - Codex alimentarius framework
- Mixed methods
 - Biological sampling
 - Household/individual questionnaires
 - Check lists
 - Participatory appraisals

3 country KAP study









Results

High level of hazards

	Nagaland		Vietnam		Nigeria	
	Present	Exceed stand				
Total bacterial count	100	23	70	52	100	98
Coliforms	92	40	86	60	90	66
<i>S. aureus</i>	93	47	41	25	13	n/a
Cysticercosis	9	9	0	0	n/a	n/a
Antibiotic residues	5%	5	9	9	n/a	n/a



**RISK REDUCING & MITIGATING
KAP**

➤ Nigeria

- ✓ 80% cook <3 hours after purchase
- ✓ 93% boil for >20 minutes
- ✓ 75% keep in fridge
- ✓ 10% eat raw meat

➤ Vietnam

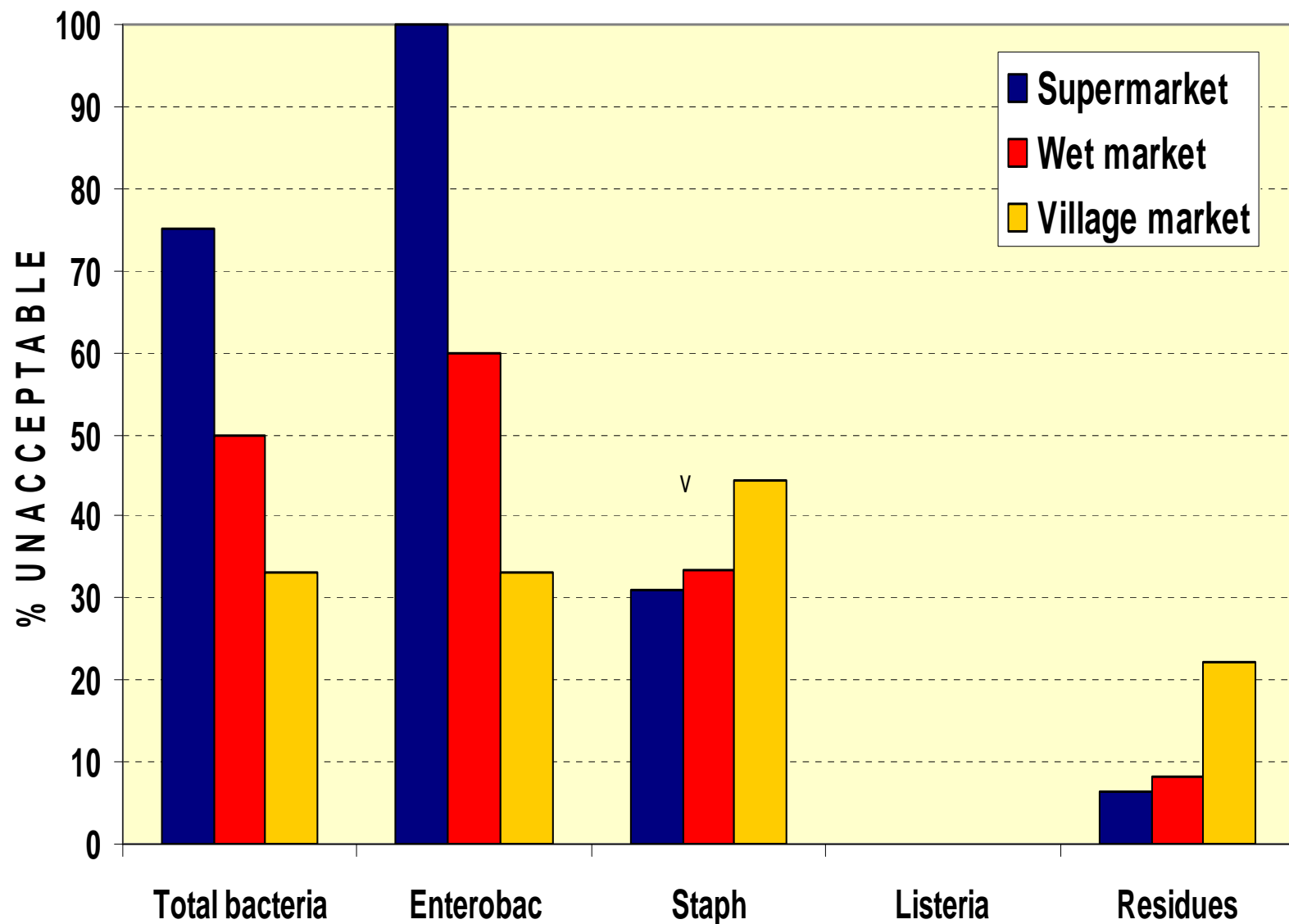
- ✓ 100% of respondents cooked food < 3 hours of purchase
- ✓ 98% cooked for >10 minutes
- ✓ 58% keep in fridge

➤ Nagaland

- ✓ 100% cook <3 hours after purchase
- ✓ 99% boil for >60 minutes
- ✓ 10% keep in fridge
- ✓ 90% keep pork 'in the chimney'

Risks

- **4% Vietnam report to GIT illness in last 2 weeks** (no relation pork or meat consumption, strong relation vegetable consumption)
- **9% in Nigeria** (strong relation meat consumption)
- **23% in Nagaland** (no relation pork, meat or vegetable consumption, strong relation hygiene)
- **43% Nigerian butchers** (strong relation group, gender, hygienic practice, eating own products)



Conclusions

- ✓ Findings support other work by ILRI in informal markets
 - ✓ Food in informal markets often contains hazards
 - ✓ But risks to human health less clear
 - ✓ And SUPERMARKET does not mean SAFE
 - ✓ Hazards, risks, practices are highly context specific
 - ✓ Many risk-mitigating practices as well as risk-enhancing along the value chain
 - ✓ Endogenous trumps exogenous
 - ✓ Concerns over food safety even among poorest
 - ✓ But over-estimate ability to control
 - ✓ Risk-based approaches can provide contra-intuitive insights implying radical changes in food safety policy and practice

Acknowledgements

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