



Agriculture, Nutrition and Health Academy Week

# Critical food system interventions for improving nutrition security in Ghana: Findings from a Food Environment Analysis

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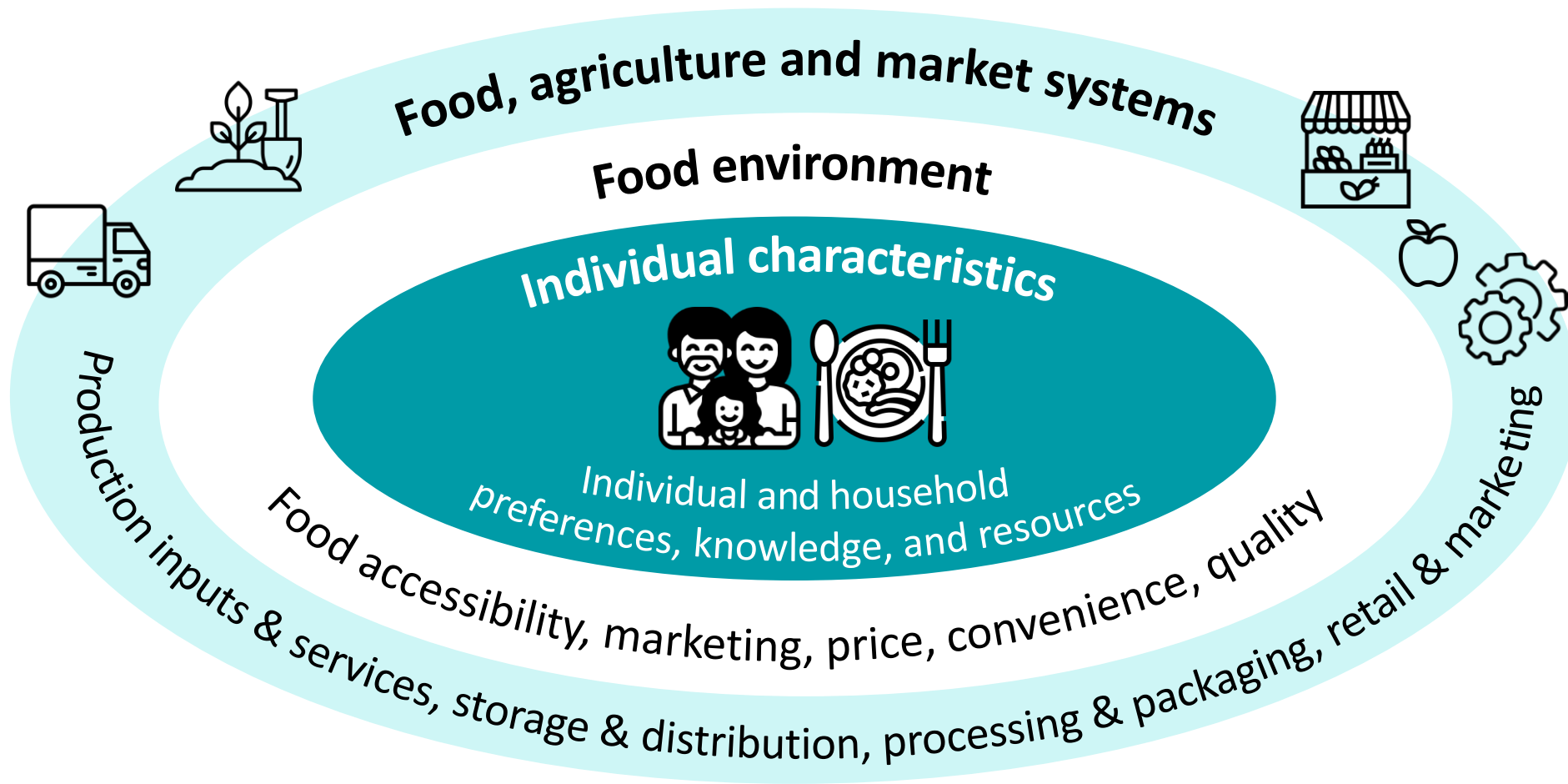


# Purpose: Identify appropriate nutrition-sensitive interventions

- Market System Resilience project:
  - Leverage points in the food system to make food environment more nutritious
  - Understand dietary impact of market shocks (COVID-19)
- Three regions in northern Ghana
- Five focus commodities:
  - cowpea, groundnut, maize, shea, and soybean
- Data collected August 2020



# Methods: Food Environment Analysis



# Methods: Food Environment Analysis

In each of three focus regions:

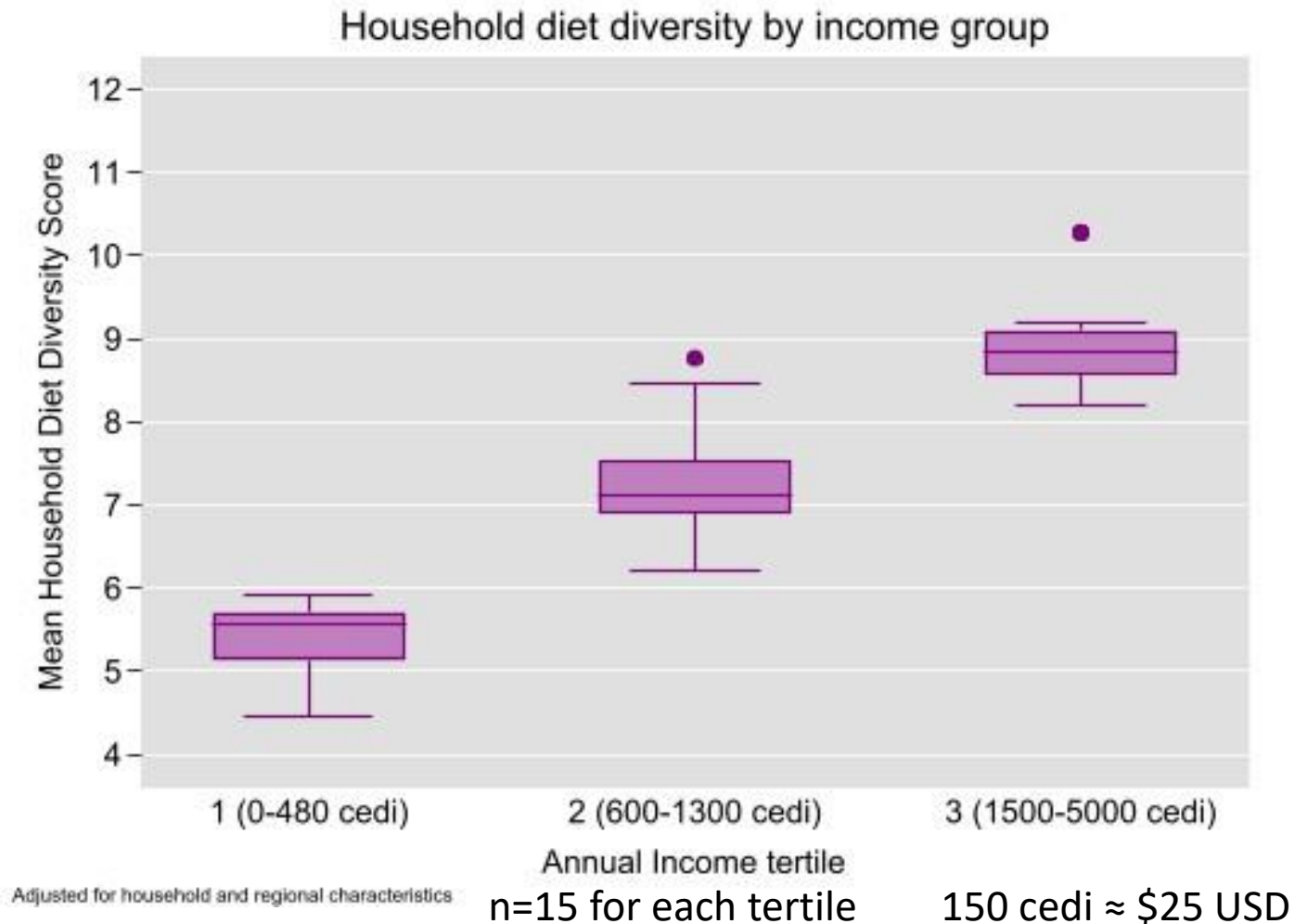
- 15 household demographic and consumption surveys (n = 46)
- One each male- and female-only consumer focus group discussion (n = 6)
- Five focus commodity vendor interviews (n = 15)
- One market management interview (n = 3)
- One market food price/availability survey (n = 3)





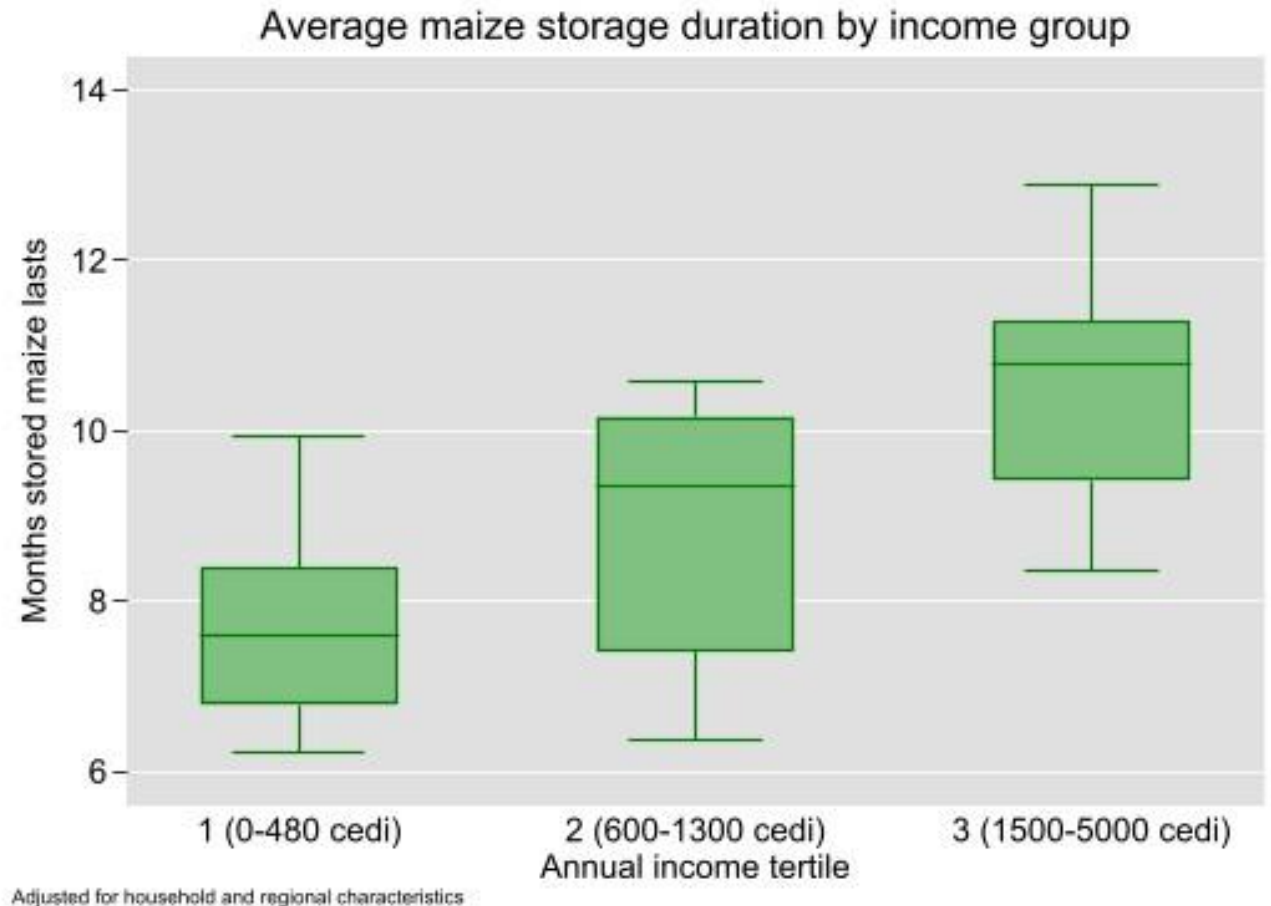
# Finding: Diets lack in both quantity and diversity

- Poorest households consume the least diverse diets
- Consumers report high awareness and desire for nutritious foods
- Price identified by consumers as the most decisive factor in food purchases
- Diverse foods were available in markets but prohibitively expensive
  - Animal-source foods were on average 7.8 times more expensive than staples.



# Finding: Households prefer to store harvest

- Strong preference to store and consume their own production, especially maize.
- Each income tertile significantly predicts an additional 2 months of maize storage.
- Poorest households must rely on markets to meet foods needs sooner



# Finding: Impact of market shock varies by season

- Households rely on markets for staples primarily during lean season, but year-round for diet diversification

	Harvest season	Lean season
Markets accessible	Food quantity unchanged	Decrease in food quantity
	Increase in food diversity	Decrease in food diversity
Markets inaccessible	Food quantity unchanged	Significant decrease in food quantity
	Decrease in food diversity	Significant decrease in food diversity

Color key

Desirable impact

No impact

Undesirable impact

Hazardous impact



## **Finding:** Retailers are constrained by capital, knowledge, and storage

- Vendors:
  - Must raise prices to account for irregular supply
  - Financially stressed from offering sales on credit, especially outside of harvest season
  - Sales fluctuate with harvest; no proper storage when high supply and low demand
- Processors:
  - Insufficient supply of high-quality inputs, especially outside of harvest season
  - Demand for products lowest at harvest when inputs are cheapest
  - Desire training and knowledge in food safety and packaging to meet consumer quality demand
  - Financing needed to diversify products beyond what can be produced at home



# Recommendations for interventions



- **Availability:** Improve availability and use of improved post-harvest handling practices and storage facilities for food processors and vendors



- **Affordability:** Marketing of home storage technologies for staples to save income for diversification purchases



- **Prices:** Facilitate cooperation of retailers for cost-sharing of equipment and bulk purchasing, support diversification of products



- **Desirability:** Create opportunities to build knowledge and capacity of processors to use nutrition-sensitive marketing messages, improved packaging, and food safety standards.



# Thank you!

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