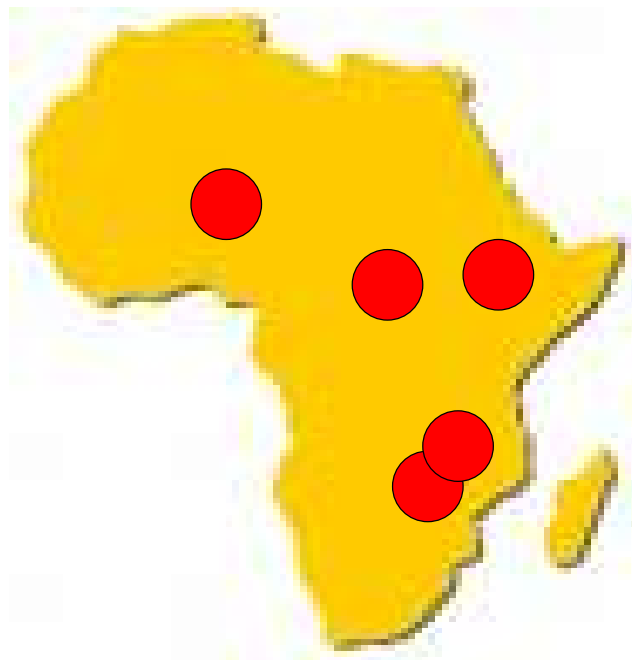


# Regional Food Staples Market Development

Steven Haggblade  
Michigan State University  
IEHA Coordination Meeting  
January 24, 2008

Africa's hunger hot spots are  
well known.



→ Africa's unenviable reputation as:

- Chronically food insecure
- Dependent on massive inflows of food aid

Today, Africa spends \$19 billion per year on food imports

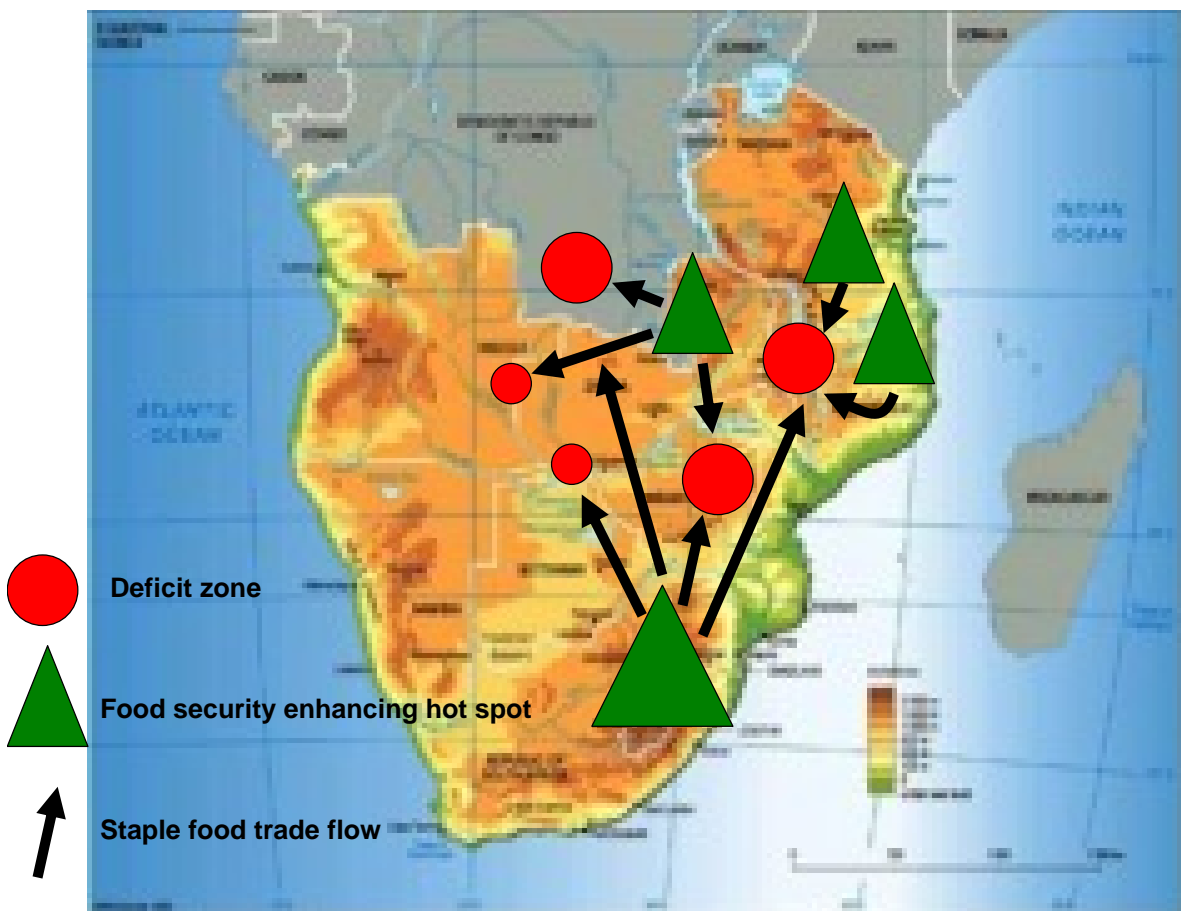
Attracts the majority of worldwide emergency food aid.

Less well-known are  
Africa's highly productive, regularly  
surplus food production zones



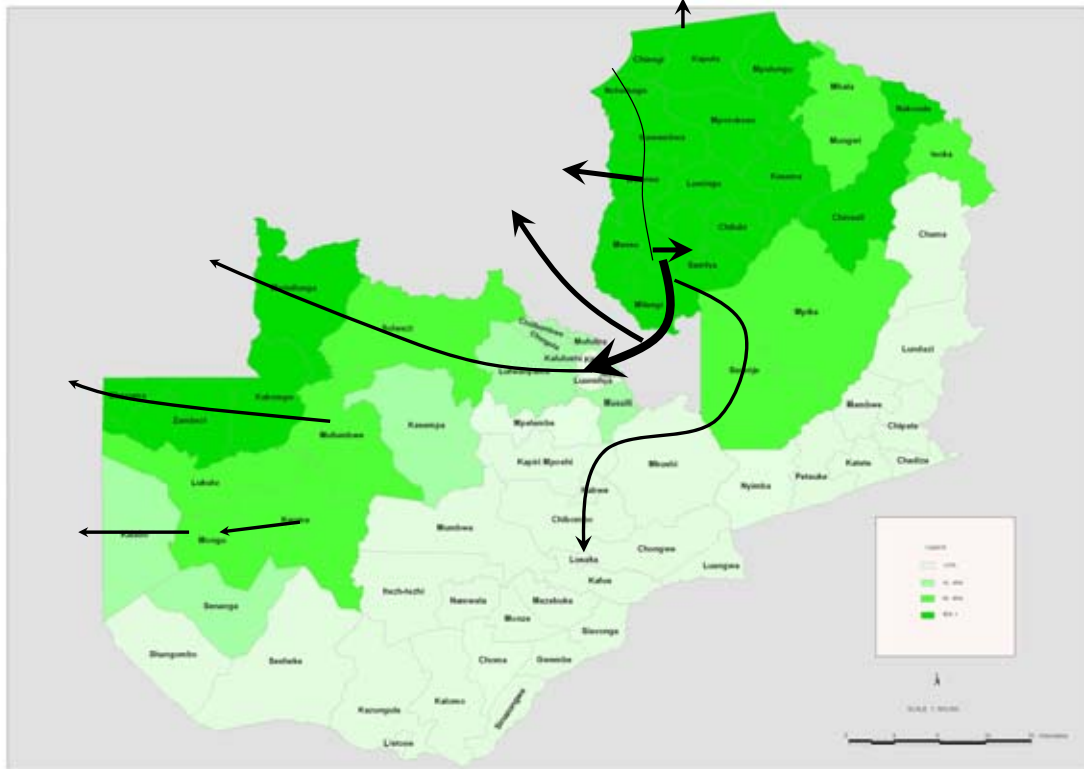
# COMESA Alliance for Commodity Trade in Eastern and Southern Africa (ACETA)

- Expand regional trade in *food staples* to link surplus and deficit zones



# Dried Cassava Trade Flows

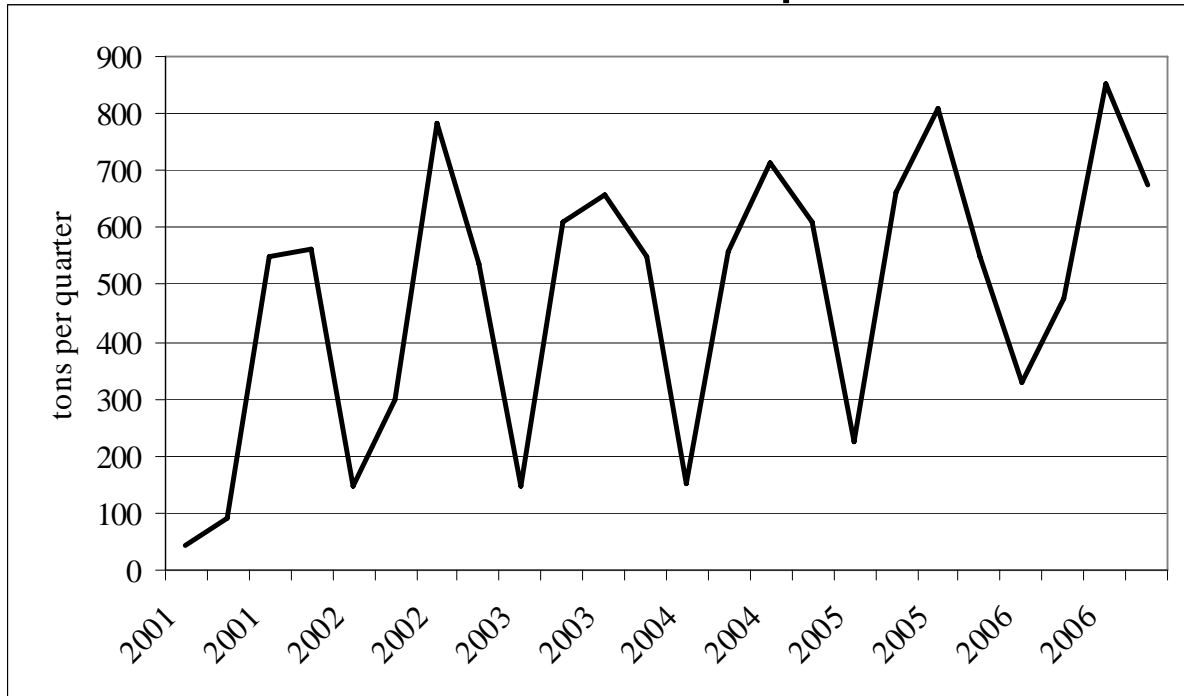
(for snack foods, flour, feeds and industrial processing)



Dried cassava transiting the Chembe border post



## Dried cassava transiting the Chembe border post



## Two keys for linking surplus and deficit food staple zones

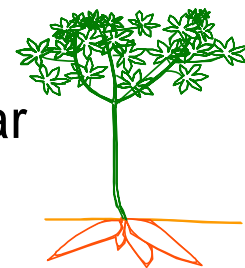
- Cross-border trade in food staples
- Consumer substitution among food staples

## Where are Africa's surplus food staple production zones?

- Areas of favorable rainfall or economical irrigation
- Multiple-staple zones
  - cassava & maize (N. Zambia)
  - banana, cassava & maize (Uganda)
  - irish potato, cassava & maize (Mozambique)
  - cassava, rice, maize (S. Tanzania)

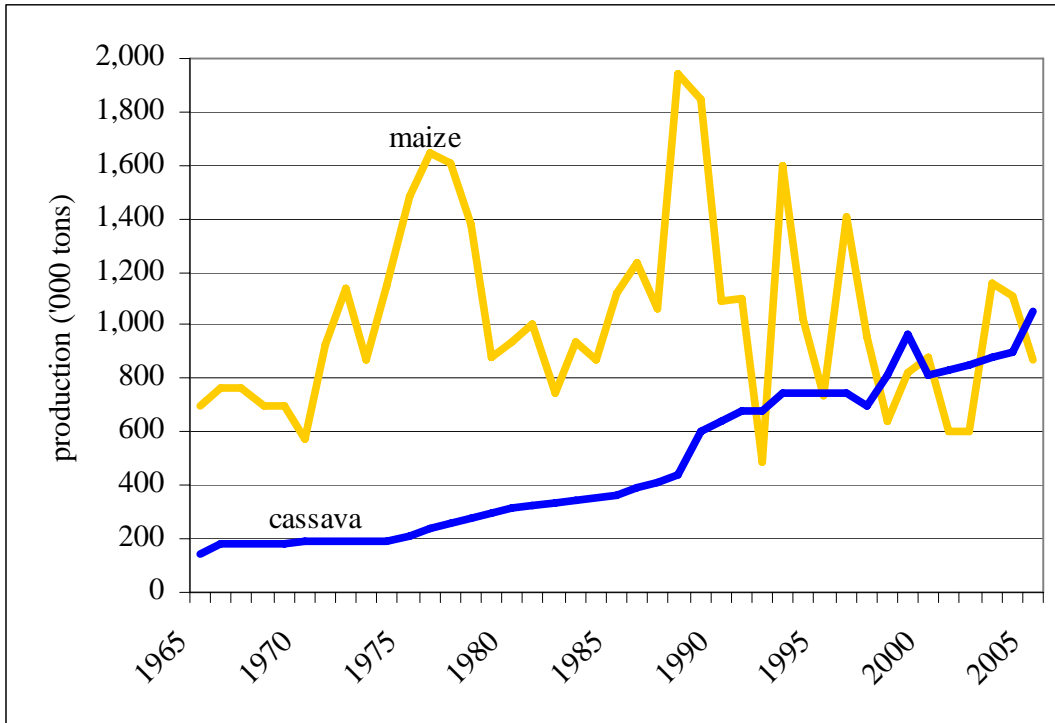
## Perennial food staples: cassava, banana

- Can be harvested any time of year
- Over multiple years
- Drought resistant
- → Dual staple zones allow farmers to expand cassava/banana production for local consumption and export maize to deficit zones in times of stress



a7

# Cassava is drought-resistant



Slide 13

a7 cassava is drought resistant. maize, in contrast, it highly susceptible to moisture. Given dependence on rainfed crop production, maize output proves extremet volatile, as a function of the rains.

aecsetup, 11/5/2007

a1

## Northern Zambia, a dual-staple zone

('000 tons of maize equivalents)	Cassava belt	Maize belt	All Zambia
Cassava	270	12	282
Maize	<b>376</b>	525	901
Cassava plus maize	646	537	1,183

Slide 14

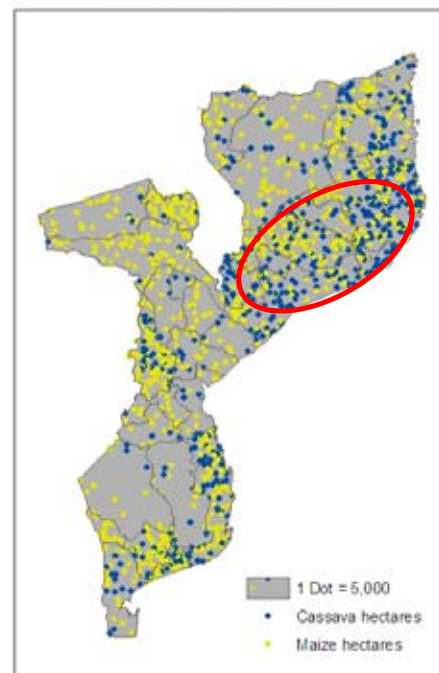
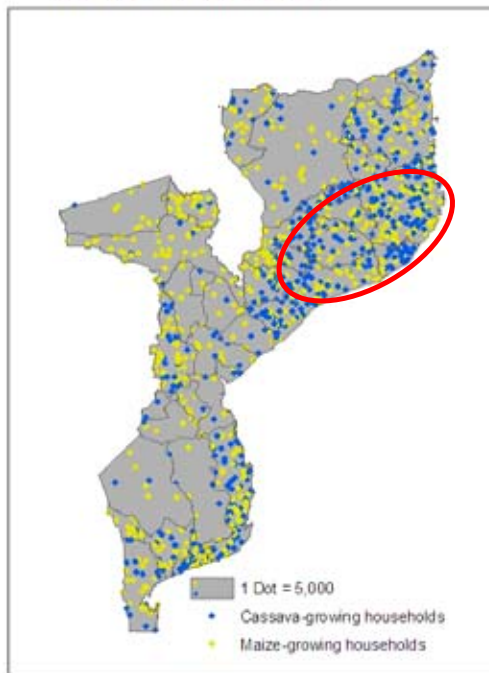
a1 Note the large volume of maize consumed in the cassava belt. Since households in this region consume both cassava and maize, they are willing and able to substitute one for the other when scarcity prevails.  
aecsetup, 11/5/2007

# Mozambique's dual staple food zones

Density of Food Staple Production in Mozambique

Number of households

Hectarage planted

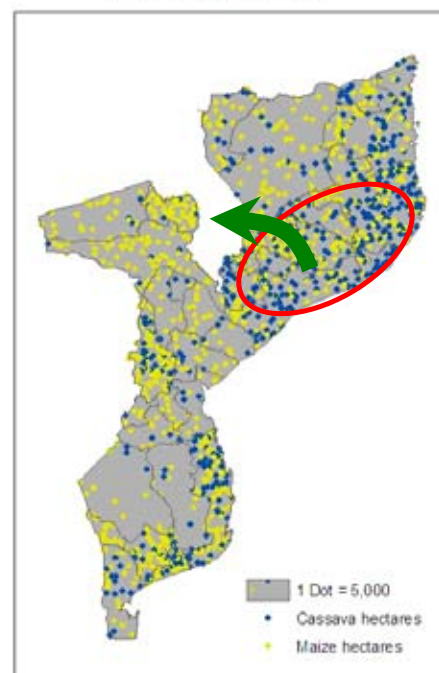
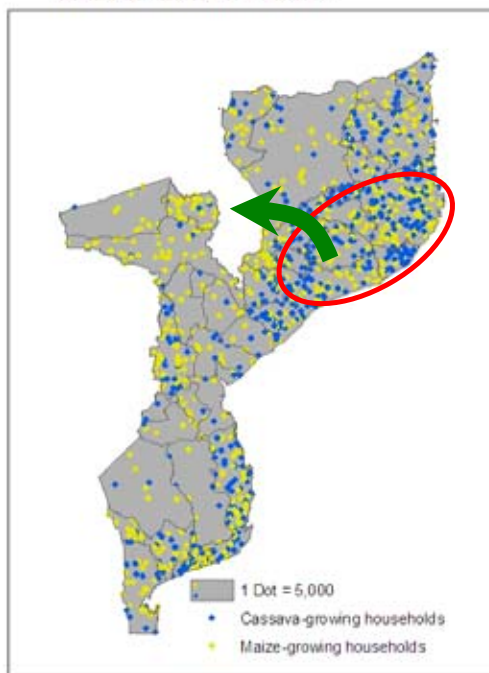


# Mozambique's dual staple food zones

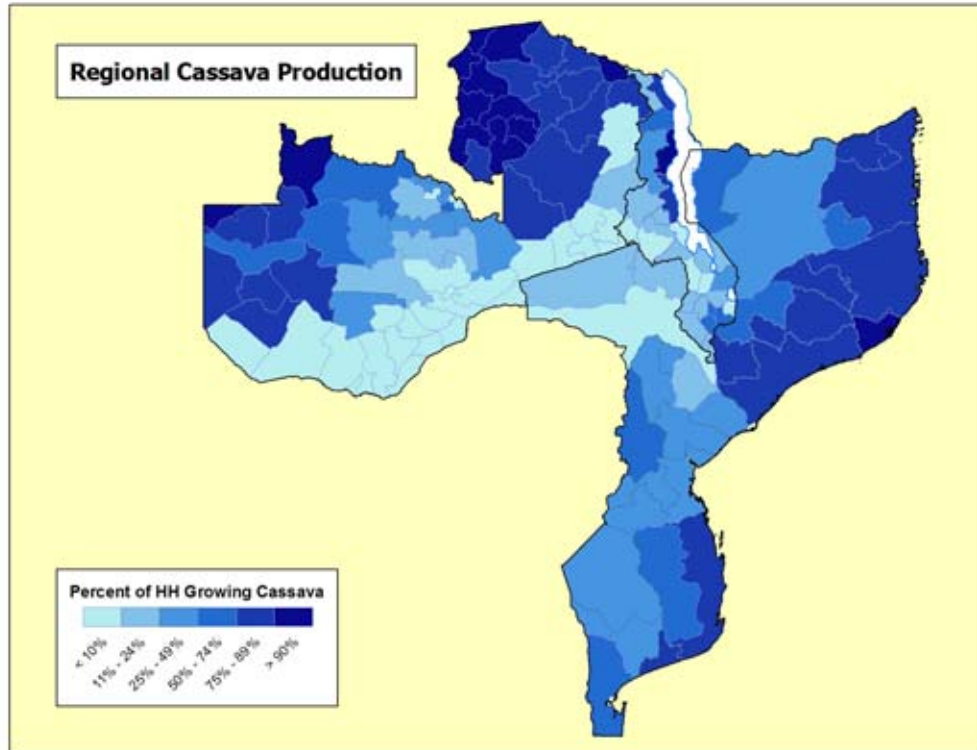
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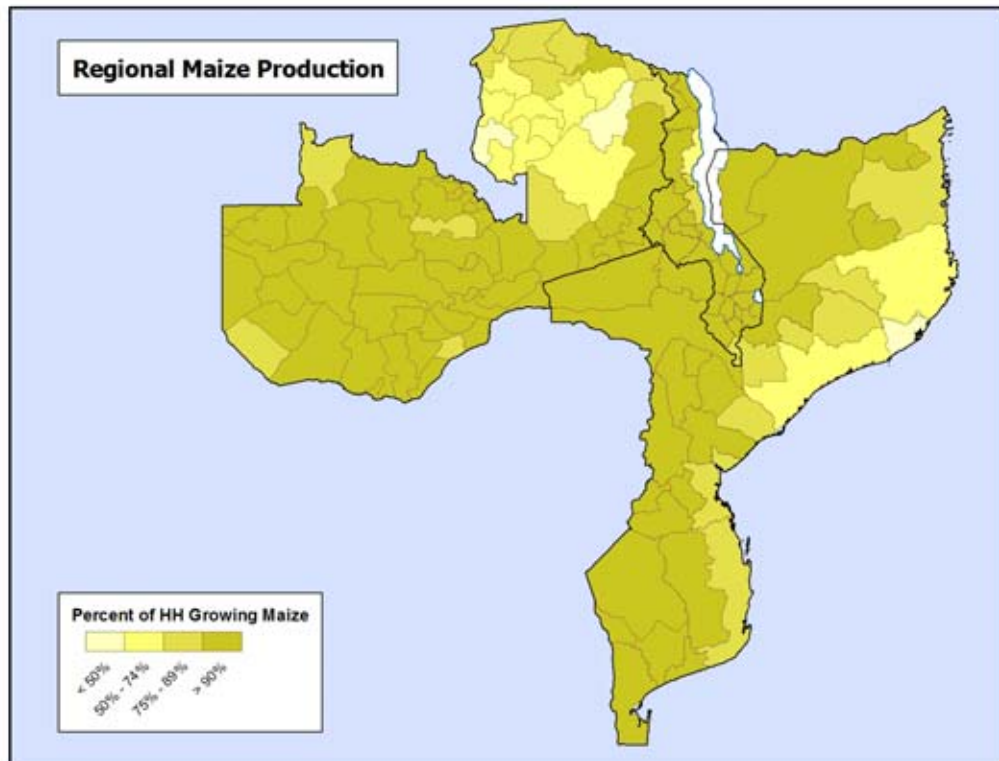
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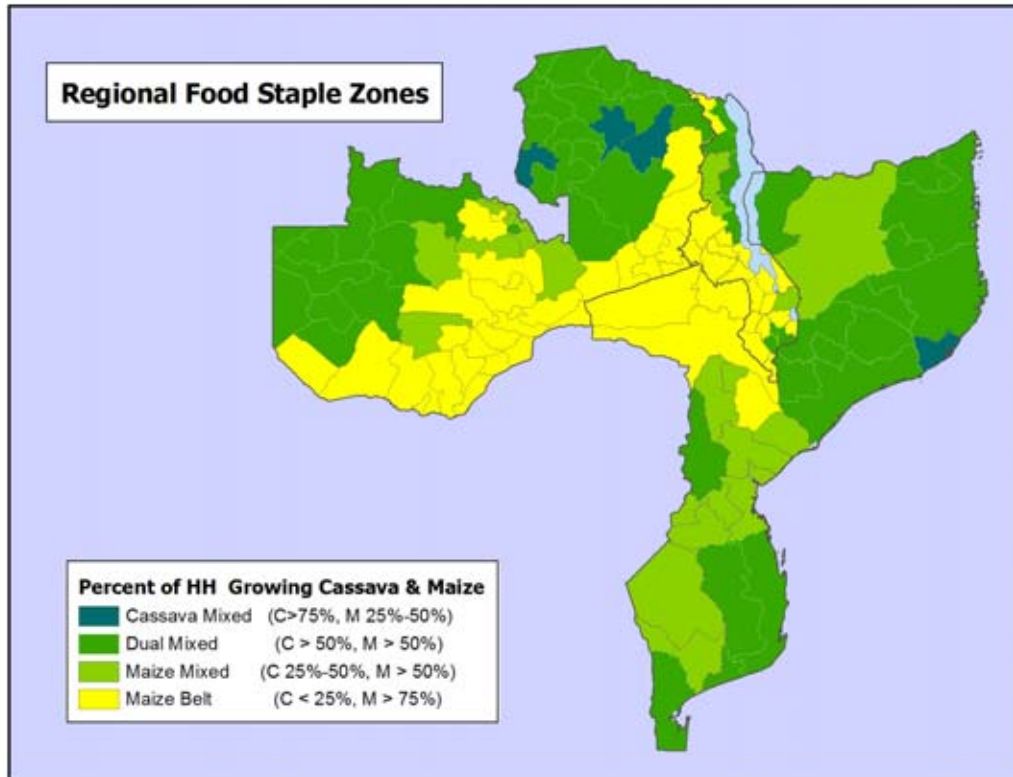
# Cassava production



# Maize production



# Dual staple zones



## Linking surplus (FSEHS) zones with deficit zones

- Improves food security in deficit zones
- Reduces price volatility
- Improves producer incentives in surplus zones
- Accelerates agricultural growth

## Despite regional trade agreements, many governments restrict cross-border trade in food staples

- Malawi and Zambia (strict controls)
- Kenya (progressively lifted restrictions)
- Mozambique, S.Africa and Mali (open border policy)



a2

## Trade policy impact on maize prices in Zambia

	Maize price under alternate trade regimes (% change from normal)	
Maize harvest	Closed border	Open border
Bumper harvest (30% above normal)	-50%	-26%
Drought (30% below normal)		

Source: Dorosh, Dradri and Haggblade (2007)

Slide 23

a2 open border moderates price increases (by capping price increases at import parity) during a drought and also limits price fall during a bumper year (by allowing exports to cushion the price fall).  
aecsetup, 11/5/2007

a4

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Maize harvest	Closed border	Open border
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Drought (30% below normal)	+ 163%	+ 36%

Source: Dorosh, Dradri and Haggblade (2007)

Slide 24

a4 open border moderates price increases (by capping price increases at import parity) during a drought and also limits price fall during a bumper year (by allowing exports to cushion the price fall).  
aecsetup, 11/5/2007

## Maize and cassava sell side-by-side



a3

## Open borders plus consumer substitution among food staples

30% fall in maize prodn	Closed border	Open border
Maize price	+163%	
Poor household consumption (‘000 tons of maize-equivalents)		
Maize	-100	
Cassava	+43	
Total	-57	

Source: Dorosh, Dradri and Haggblade (2007)

- a3 Column 1 shows the importance of consumer substitution of cassava for maize (this occurs primarily in the cassava belt). A simpleminded food balance sheet approach to the drought would estimate a 100,000 ton maize shortfall. Government and donors would import too much maize.  
 Column 2 shows the benefits of consumer substitution and cross-border trade. Together, these two private sector responses would mitigate two-thirds of the maize shortfall facing vulnerable households.  
 aecsetup, 11/5/2007

a5

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Poor household consumption (‘000 tons of maize-equivalents)		
Maize	-100	-43
Cassava	+43	+11
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aecsetup, 11/5/2007

## COMESA Alliance for Commodity Trade in Eastern and Southern Africa (ACETA)

- Expand regional trade in food staples to link surplus and deficit zones
- Increase farm incomes through commercialization of food staples
- Spur industrial processing of food staples

# Regional trade



# Farm commercialization



# Industrial processing

