Buffer stocks (P. Stocks) for food price stabilization

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Presented at the COMESA policy seminar
"Food price variability: Causes, consequences, and policy options"
on 25-26 January 2010 in Maputo, Mozambique
under the COMESA-MSU-IFPRI African Agricultural Markets Project (AAMP)

Outline

- Clarifying the concepts:
  - Distinctions between buffer stocks and strategic grain reserve.
- Commonly given rationales for buffer stock policies.
- Critical determinants of success.
- The challenges and lessons learned.

Distinctions between strategic reserves and buffer stock

Indictors	Strategic Reserves	Buffer stocks
Program characteristics		
Types of operations	Addressing shocks / Emergencies	Food Price stabilization
Target groups	Food insecure / vulnerable	Farmers and consumers
Governments' roles		
Proc & Dist	NO	YES
Price setting	NO	YES
Trade	NO	YES

Commonly given rationales

Commonly given rationales	Economists' terms
Inadequate infrastructure	Public goods
Imperfect price information	Information Asymmetry
Missing credit & insurance markets	Institutional failure
Technology promotion (green revolution)	Inst failure (risk management)
Limited reserves for int. trade	Liquidity constraints
Volatility of international price	Strategic response
Political sensitivity	Strategic response

Sources of staple food variability

Source of variability	Explanation
Weather-related variability in production	Supply shocks cause large variation in staple food prices
Unimodal rainfall	Single harvest and greater seasonal variation in staple food prices
Poor transport infrastructure	High transport cost creates wider gap between import and export parity, limits distribution of food out of surplus zones
High transaction costs	Same effect as high transportation costs
Trade barriers	Creates wider gap between import and export parity, which are bounds of domestic prices
Reliance on one staple	Makes demand for dominant staple inelastic (small supply shock → big change in price)
Unpredictable policy intervention	Discourages private traders from investing in and carrying out storage and trade.

- **Two critical elements: (a) institutions, (b) appropriate regulations**
  - Prices commission
    - Monitor costs of production
    - Determine floor and ceiling prices,
    - provide market information (both domestic and international),
    - Clear research support

THESE ARE ALL VERY DIFFICULT TASKS

Regulations

Regulations to facilitate public food stock agencies

- Monopoly control over international trade
- Restrictions on movement of grain
- Restriction on private stock
- Preferential access to credit
- Restrictions on financial instruments

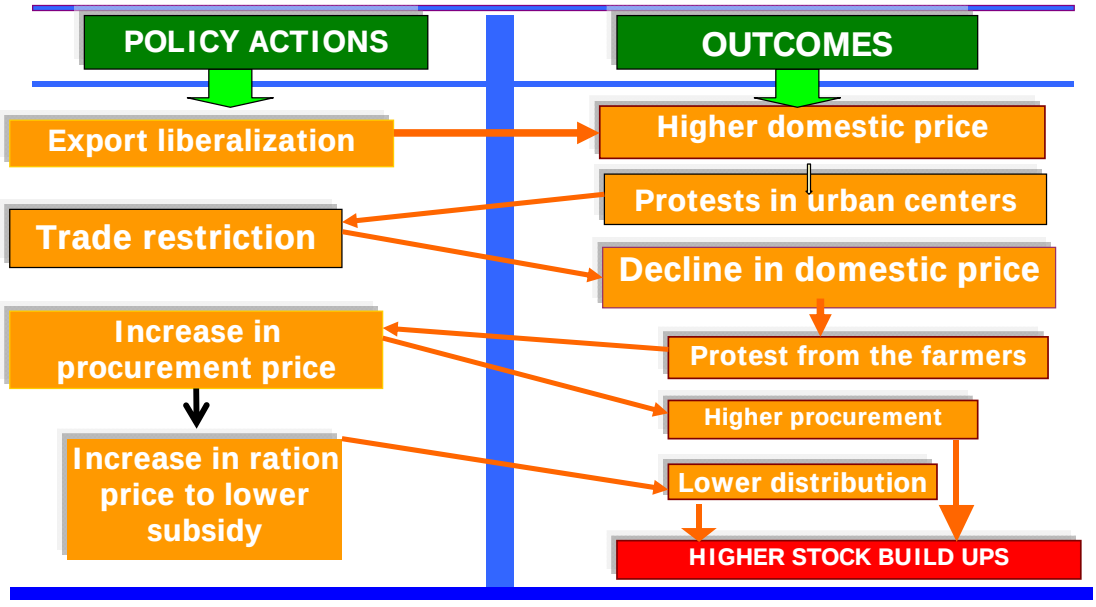
Buffer stocks in practice (1)

- Political pressure from farmers to set high floor (buying) price; political pressure from consumers to set low ceiling (selling) price
- Buffer stocks can be very expensive, particularly if government yields to political pressure in setting prices
- Delays in decision-making and funding mean that interventions occur late, sometimes exacerbating the volatility
- Displaces private sector from storage activities, making government entirely responsible for stabilization

Buffer stocks in practice (2)

- Occasionally, stock will run out, price will skyrocket, and government will be blamed
- Occasionally, funds for buying food will run out, price will drop sharply, government will be blamed
- Excessive administrative costs of government entity managing the buffer stock due to over-staffing, lack of cost discipline, etc.
- Temptation for corruption in purchase and sale of staple food (e.g. Malawi 2001 and Kenya 2008)

Challenges: once adopted, hard to get out



Lessons from Asia

- In India, government's subsidy bills for buffer stocking have increased from US$160 million in 1992 to an estimated US$1.6 billion dollars in 2002;
- In Indonesia, total costs of inefficiency in BULOG are estimated at US$2.0 billion over a five year period, starting in 1993;
- In the Philippine, average annual losses to the society due to National Food Authority's (NFA) interventions are estimated at more than US$ 414 million dollars during 1996- to 1998 time period.
- Wheat subsidies in Punjab have exceeded total expenditure by the department of agriculture.

Remedies for staple food variability

Source of variability	**Remedies to reduce variability**
Weather-related variability in production	Agricultural research & extension, production forecasting, irrigation, drought-resistant crops
Unimodal rainfall	Invest in post-harvest storage technology, allow off-season imports
Poor transport infrastructure	Invest in roads, bridges, and ports
High transaction costs	Grades and standards, market information systems, commercial credit, contract enforcement
Trade barriers	Commitment to open borders for staple foods, streamline paperwork at borders
Reliance on one staple	Promote secondary staple crops
Unpredictable policy intervention	Reduce intervention in trade and storage, make interventions predictable

Summary (1)

- There are clear distinctions between strategic food reserves and buffer stock for price stabilization
  - Properly managed strategic grain reserves can address emergencies and save lives
- Implementing buffer stock policies for price stabilization is a very difficult task
  - Associated institutions are difficult to develop
  - Associated regulations can induce unpredictability and hence further aggravate market efficiency

Summary (2)

- Even though worked in the early years of green revolution in Asia, they proved very expensive in later years
- This are short run measures. However, once started, it's very difficult to get out.

Summary (3)

Source of variability	Remedies to reduce variability
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Uni-modal rainfall	Invest in post-harvest storage technology, allow off-season imports
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Summary (4)

High transaction costs	Grades and standards, market information systems, commercial credit, contract enforcement
Trade barriers	Commitment to open borders for staple foods, streamline paperwork at borders
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Unpredictable policy intervention	Reduce intervention in trade and storage, make interventions predictable

Address the root causes of price variability!!