Mechanisation and its Place in Food Systems

Workshop on Harvesting and Postharvest Mechanization, China

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Food systems & Small-holder Focus - Core of WFP Programs

Food systems matter to SRs 1-3 - 2. Smallholders are the focus of SR3

SRs 5-6 matter to food systems - 4. Sustainable Food Systems

Food systems are the focus of SR4

Smallholders are the focus of SR3

Sustainable Development Goals

WFP Strategic Goals

1. Support countries to achieve zero hunger (SDG 2)
2. End hunger
3. Improve nutrition
4. Achieve food security

WFP Strategic Objectives

1. Access to food (SDG 2)
2. End malnutrition
3. Smallholder productivity and incomes

WFP Strategic Results (SDG Targets)

NATIONAL SDG TARGETS

Food Systems

1. Zero hunger
2. Food security
3. Smallholder productivity
4. Sustainable food systems

WFP OUTPUTS

WFP ACTIVITIES (generate WFP Outputs)
MECHANISATION
FAO and occasionally WFP

MECHANISATION
mostly WFP
The need for food assistance arises from flawed, disrupted, and broken food systems.

WFP's food assistance basket:
- Cereals (rice, maize, etc)
- Pulses (beans, peas, lentils, etc)
- Veg. oil (soya, palm, corn, etc)
- Specialized fortified foods
- Canned fish/meat
- Salt
- Sugar

Note: cereals and pulses could be bought locally (in recipient country)
Supply-Demand Dynamics

Issues:
- Subsistence farming
- Infrastructure
- Demographics & Urbanization
- Knowledge & Capacity
- Non-integrated markets
- Land ownership
- Tradition
- Governance
- Security
- ... etc...

Commercial and Enabling Environments (India & DRC examples)

Quality

Evolution:
- “Local” purchase of food (staples)
- Purchase for progress (P4P)
- Small-holders in focus
- Food systems
- Holistic (multidisciplinary) programming

P4P aims to increase supply & demand for higher quality, nutritious food products AND improve smallholders' markets

Demand

Supply
**Wheat Market**

- **Total Need** = ~5 million MT
- **Domestic production** = ~3.4 million MT *(MAIL, 2011)*
- **Imports** = 800,000-1.5 million MT/year *(varies by source, MAIL, CSO or Customs Office)*
- **Only a small share of domestically produced wheat is sold in the market, most is:**
  - Consumed by farm households
  - Used to pay land rents or repay debts,
  - Shared with landlords, or bartered *(Schulte, 2007)*
Wheat Market Structure

- Farmers
- Importers
- Small Scale Millers (zirandas)
- Larger Millers / Food Processors
- Distributors/ Wholesalers
- Retailers/ Bakers
- End Consumers
**Vision of Purchase for Progress (P4P) in Afghanistan**

To create a positive commercial climate and expand market opportunities for agriculture products and nutritious foods in Afghanistan, with ultimate goal for these activities to become commercially self-sustaining.

P4P project is now being integrated with other projects and assistance transfer modalities into a Country Strategy Plan (CSP) – to be approved in second half of 2018.

- **Tractors; thrashers, etc**
- **Food processing plants; micronutrient-fortificants & dispensers; etc**
- **Lab and testing equipment, etc**
Multidisciplinary Programming – example: Bangladesh Country Strategy Plan (CSP)
Thank You.

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