Giving Farmers a Fighting Chance:
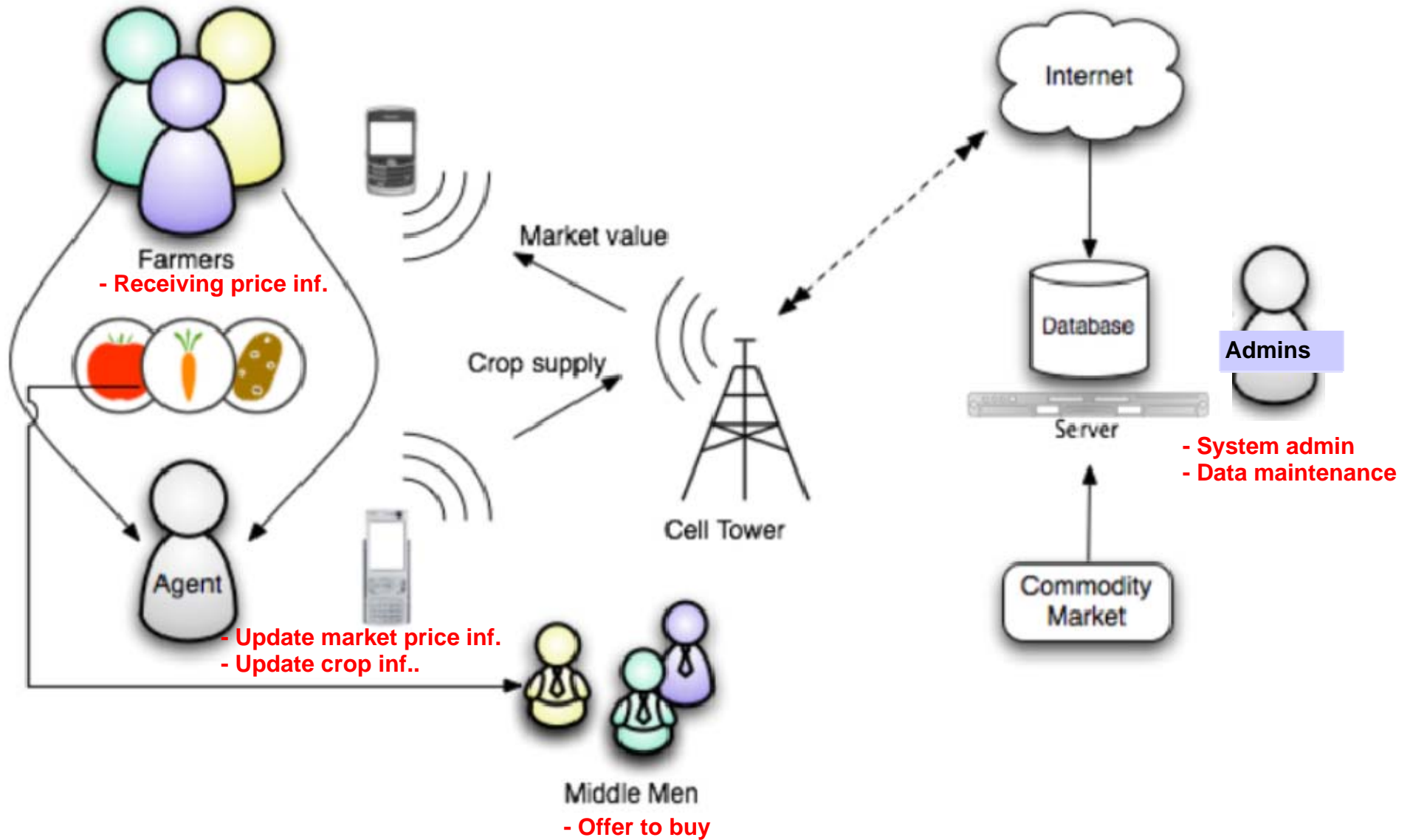## Transforming the Rural Economy in Zacatecas through Mobile Technology

Milestone #4

System Review

Farmers
- Receiving price inf.

Agent
- Update market price inf.
- Update crop inf..

Middle Men
- Offer to buy

Market value

Crop supply

Cell Tower

Internet

Database

Server

Commodity Market

Admins
- System admin
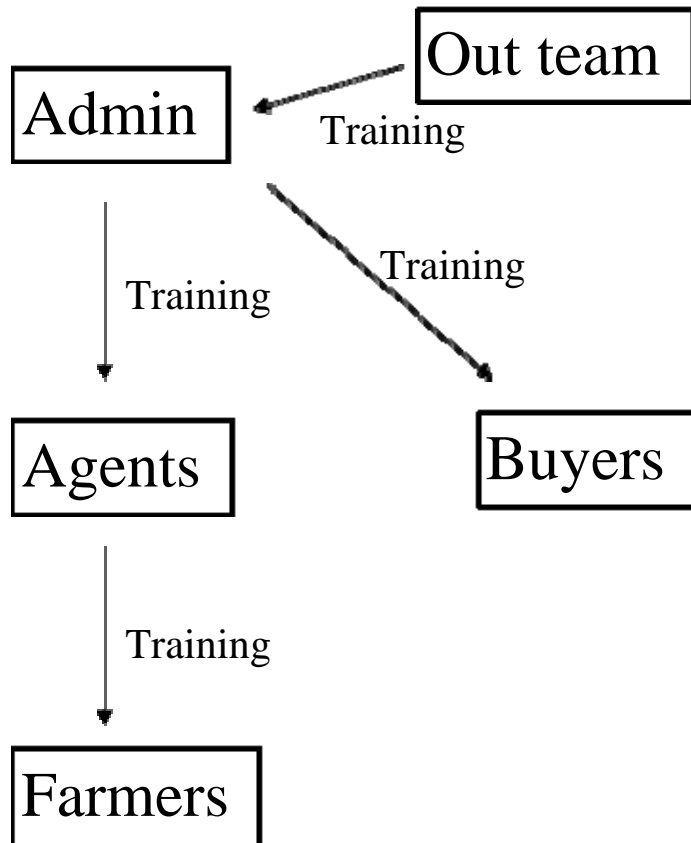- Data maintenance

Sustainability Overview

- Human Resources
  - (initial stage) Managed by our team & partner
  - (future) Independent as NPO
- Technology
  - (initial stage) Training by our staff
  - (future) Self-training and apprenticeship
- Operational
  - Incorporate farmers from current trials
- Financial
  - (initial stage) Financial support from banks
  - (future) Continuous investment by farmers
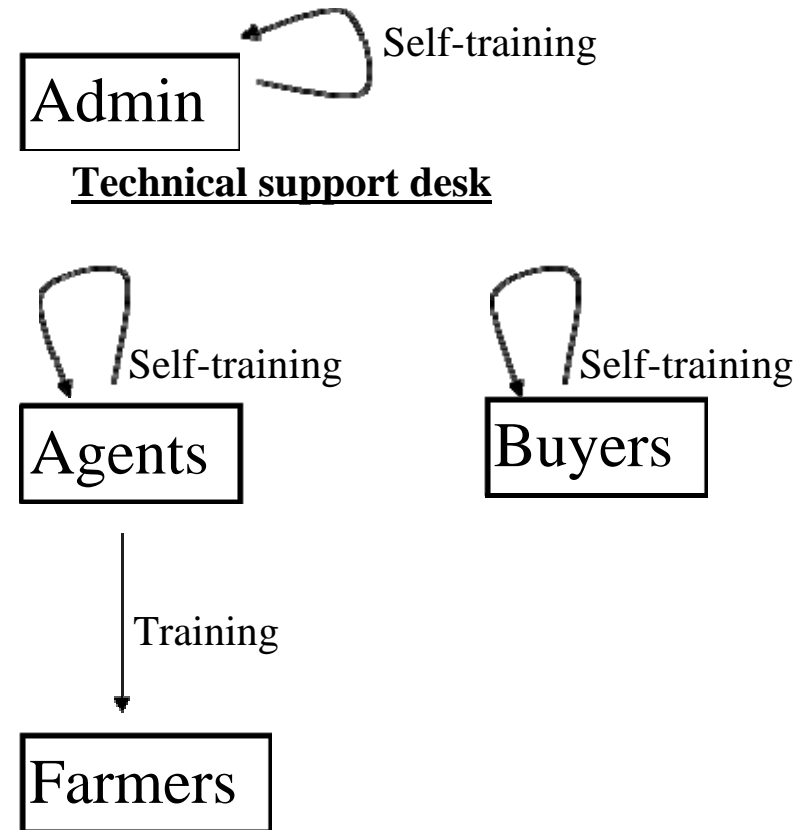
Human Sustainability

- Project Managers
  - (initial stage) Our team & partner
  - (future) Employed managers
- Administrators
  - (initial stage) Our team & ITESM students
  - (future) Employed technicians
- Agents
  - Local village leaders
  - Liaison between project and government
- Farmers
  - Farmers
- Buyers
  - (initial stage) Existing middlemen
  - (future) Existing middleman and whole sellers / retailers

Technological Sustainability

(initial stage)

Admin

Out team

Training

Training

Training

Agents

Buyers

Training

Farmers

(future)

Admin

Self-training

Technical support desk

Self-training

Self-training

Agents

Buyers

Training

Farmers

Financial Sustainability (1)

(initial stage)

- Income
  - Support from Gov

- Outcome
  - PC, Cell phones
  - Other equipments
  - Software development (incl. documentation)

(future)

- Income
  - Commission fee from farmers
  - Support from Gov

- Outcome
  - Operating costs
  - Labor costs
  - Continuous investment

Financial Sustainability (2)

(US$)	(initial stage)	a FY (in future)
IN	**15,000**	**80,000**
1. Support from Gov (or ITESM	15,000	20,000 (Covering operating/management cost)
2. Commission fee	0	60,000 ($2,000/yr from each community)
OUT	**15,000**	**77,400**
Investment	*15,000*	*4,700*
1. Server, PC, Cell phone	10,000	4,000 (Total value $20,000, 5 yrs life)
2. Other equipments	5,000	700 (7 yrs life)
Operating/Management cost	*0*	*15,700*
1. Office rent	0	10,000 (Studio size office - less than $1,000/mon)
2. Communication charges	0	900 (Broadband $75/mon)
3. Lighting, Heating, etc.	0	2,400 ($200/mon)
4. Others	0	2,400 ($200/mon)
Labor cost	*0*	*57,000*
1. Manager	0	16,000 ($16,000/yr)
2. Technical staff	0	16,000 ($16,000/yr)
3. Local Agents	0	25,000 ($500/yr * 30 communities)
TOTAL	**0**	**2,600**

Assume that annual income of a farmer family improves from $2,000/yr to $4,000/yr. If there are 20 families in a community, a family pays $100/yr for this project. (**5% of income improvement**)

Qs/Cs?

MAS.965 / 6.976 / ES.S06 NextLab I: Designing Mobile Technologies for the Next Billion Users
Fall 2008