

Agro Information Centre, AIM-Azerbaijan

Transfer to paid Agricultural Extension:

Achievements of a situation specific, client-oriented training and advisory concept for independent advisors in Azerbaijan

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### Outline

Background to the working area and the extension structure of AIM

Methods used by the M&E department of AIM

• Results on the monitoring and assessment of extension clients

•Results on the monitoring and assessment of extensionists (Agricultural Advisors)

Conclusions & Outlook

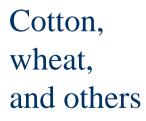




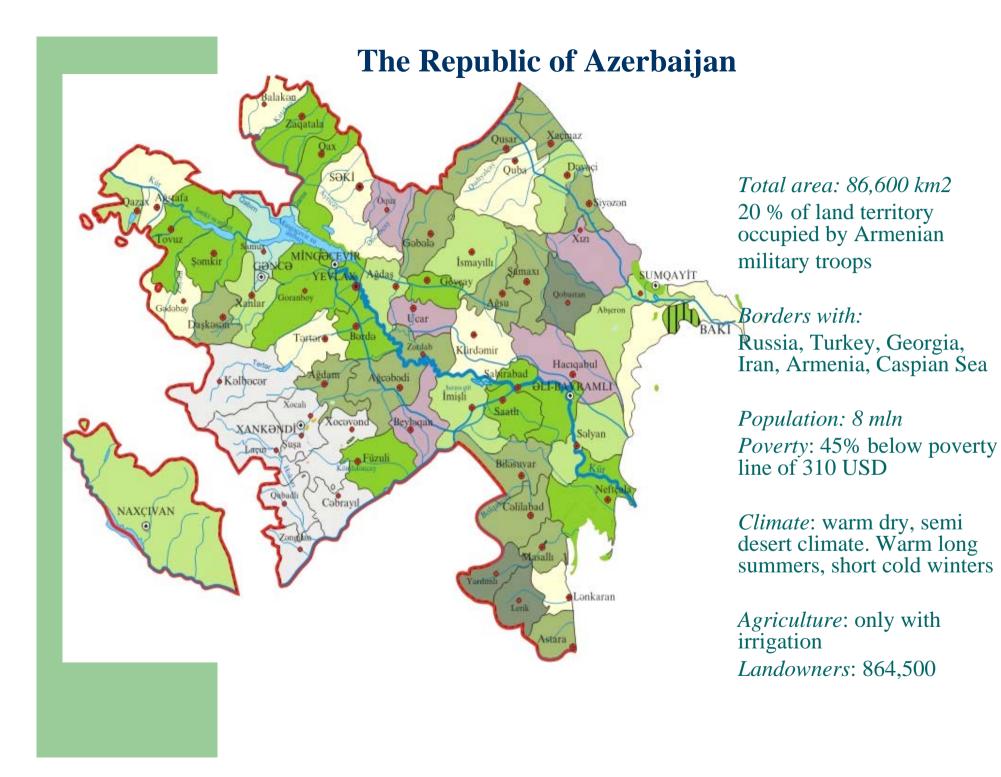
(off-shore) oil and gas based economy in Baku and its vicinity

Agriculture based rural economy









#### **Farmers' problems following privatisation**

Cut-off from production subsidies
Break away of traditional market outlets
Low prices for agricultural products

- •Rising costs of farm inputs
- Outdated irrigation network



- •Agricultural equipment insufficient, poor quality, high maintenance and operations costs, spare parts are lacking
- Animal traction
- •Saline, polluted and impoverished soils
- Auxiliary infrastructures lacking
- Limited knowledge of new landowners



### Agro Information Centre, AIM-Azerbaijan

November 1999: Non-for profit, non-religious, non-political, National Non-Governmental Organisation

#### **Objective:**

To improve self-reliance and productivity of the privatised farmers by delivering demand driven information and extension services



## **Activities to reach objectives**

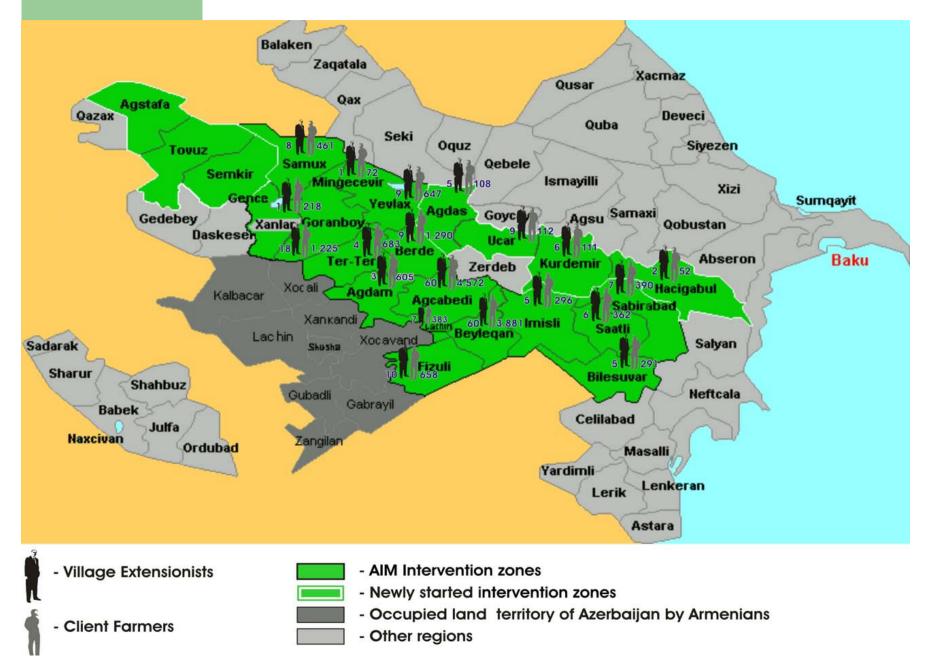
- Training of private Agricultural Advisors (AAs)
- Direct delivery of agricultural extension services
- Farmer group development
- Short-term consultancy services
- Resource Centre development
- Agricultural Publications
- Update Agricultural Library
- Agricultural Technical Assistance



# Programs

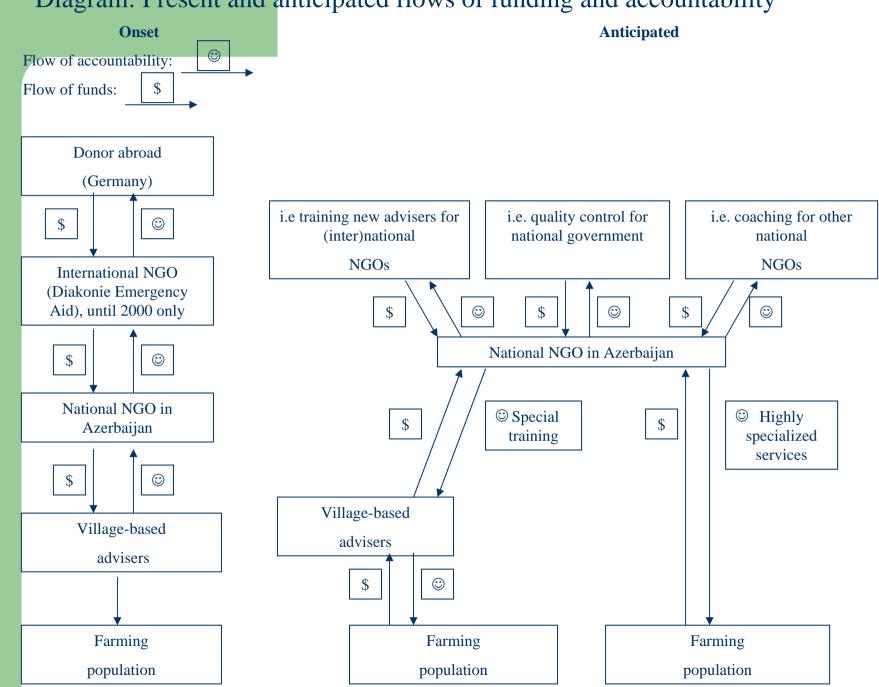
1. AIM – Diakonie Emergency Aid, Germany;	2000-2002
EVANGELISCHER ENTWICKLUNGSDIENST e.V EED, Germany;	
Interchurch organization for development co-operation- ICCO, Netherlands	
2. AIM - EVANGELISCHER ENTWICKLUNGSDIENST e.V EED, Germany;	2003-2005
Interchurch organization for development co-operation- ICCO, Netherlands	
3. AIM - Action Against Hunger, Spain	2000-2002
4. AIM - Save the Children, US	2001-2003
Integrated Community Development Program, MCI/USAID	
5. AIM - Save the Children, US	2003-2005
Baku-Tbilisi-Ceyhan/Community Investment Program	
6. AIM - International Rescue Committee, US	2001-2003
Integrated Community Development Program, MCI/USAID	
7. AIM - International Rescue Committee, US	2004-2004
Baku-Tbilisi-Ceyhan/Community Investment Program	
8. AIM - Save the Children, US	2004-2005
Integrated Community Development Program, MCI/USAID	
9. AIM-World Vision, International	2004-2004

## **AIM** intervention area



## **Centerpieces of AIM approach**

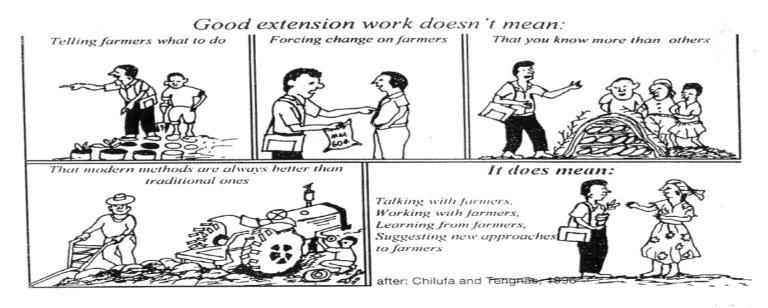
- strengthening the demand-side for services
- promoting direct contracts between farmers and AAs,
- offering fee-based service delivery to farmer clients, and,
- AAs remaining effective and functional after financial support during the training phase



#### Diagram: Present and anticipated flows of funding and accountability

Between 2000-2004: 210 private village-based agricultural advisors (AAs) were trained.

Training and educational programs blended lectures, field visits, onthe-job-training and tailor-made coaching.



Monitoring & Evaluation Unit Annually surveyed 70 "contact farmers" in 14 villages in Agjabedi and Beylagan 55 "reference farmers" in 11 villages

Selected and trained AAs together with M&E staff of AIM Parameters: farm labor force, physical assets, machinery, land use, plant and livestock production, off-farm and total family income and farming knowledge

#### **Results M&E extension clients**

Key indicators of farm welfare in Agjabedi and Beylagan regions in 2002-2003 with and without extension providers. (In brackets: the percentage of the share in total family income).

Indicator (means per farms or household)	2002	2003	2003
	(+ extension)	(+ extension)	(- extension)
Family members (numbers)	6	6	5
Working members (numbers)	3	3	2
Employees (numbers)	1	4	1
Own land (ha)	3.1	3.3	3.6
Cultivated land (ha)	3.7	3.9	3.4
Wheat area (ha)	2.0	1.8	2.3
Wheat yield (t ha <sup>-1</sup> )	2.25	2.78	2.30
Wheat net income (mln. AZM)	1.3 (16%)	1.6 (16%)	1.1 (16%)
Wheat income (mln. AZM ha <sup>-1</sup> )	0.7	0.9	0.5
Alfalfa area (ha)	1.5	1.8	2.1
Alfalfa yield (bails ha <sup>-1</sup> )	466	551	366
Alfalfa net income (mln. AZM)	1.2 (15%)	1.7 (16%)	1.3 (19%)
Alfalfa income (mln. AZM ha <sup>-1</sup> )	0.8	1.0	0.6
Cotton area (ha)	1.5	1.8	1.8
Cotton yield (t ha <sup>-1</sup> )	2.0	2.28	2.04
Cotton net income (mln. AZM)	2.4 (30%)	3.5 (34%)	2.7 (40%)
Cotton income (mln. AZM ha <sup>-1</sup> )	1.6	1.9	1.5
Vegetables area (ha)	0.9	0.7	0.2
Vegetables yield (t ha <sup>-1</sup> )	17.8	16.0	10.0
Vegetables net income (mln. AZM)	2.4	2.2	0.6
Plant prod. net income (mln. AZM)	3.4 (42%)	4.8 (47%)	2.7 (40%)
Livest. prod. Net income (mln. AZM)	2.2 (27%)	3.1 (30%)	1.4 (21%)
Additional income (mln. AZM)	2.4 (30%)	2.4 (23%)	2.7 (40%)
Total family net income (mln. AZM & USD)	8.0 (1630)	10.3 (2100)	6.8 (1390)

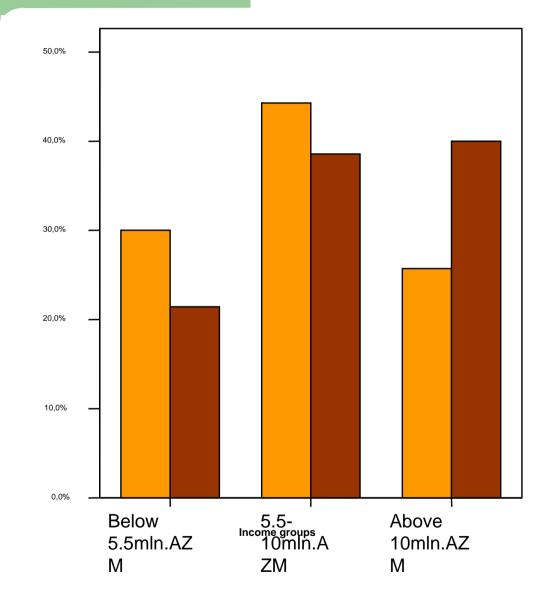
#### **Results M&E Extension clients**

In 2003, contact farmers had compared to reference farmers:

- 1) significantly higher yields (p=0.013)
- 2) significantly higher expenses
- 3) 80 USD more net income per ha of land
- cultivated with wheat (highly significant
- (p=0.005). (Also for cotton and alfalfa production).



#### Farm income groups in Beylagan and Agjabedi regions



Year 2002 2003

> -In 2003, the share of low-income farmers decreased to 21%,
> -the share of highincome farmers increased to 40%.
> -In 2002, about 4% of the contact farmers had a net income of more than 4,080 USD. In 2003, 9%.

### **Results M&E Extension clients**

*Contact farmers had increased productivity due to:* 1) better farming practices;

2) more extended knowledge of, and skills in production technology and input use (seeds, varieties, mineral fertilizers);

3) increased awareness of agricultural land value;

4) higher interest in animal production;

5) possessed more knowledge on production technology and livestock hygiene due to extension from AAs;6) invested in labor into plant and livestock production;7) net income increases & job creation by contact farmers.

#### **Results M&E Extension clients**

Labor costs were a most limiting factor for higher incomes, evidenced by the positive correlation between the number of working family members and cotton area (r = 0.33), cotton harvest (r=0.34), and cotton net income (r=0.35).Potentially higher incomes with increased vegetable productions were obstructed by high initial investments in seeds and transportation costs.

#### Strategic steps for mobilization of village based field staff

Steps		What	How	Who
1	Identification and listing of candidatesRecruitment of extension field staff candidates		Intensive discussions with key resource persons in communities.	NNGO field and supervising staff, farmers and local authorities
2			Identification of selection criteria. CV collection & analyses Group meetings	NNGO staff with the assistance of foreign experts
3	Training of extension field staff candidates		Class room training Field/practical training Field coaching and video	NNGO staff with the assistance of foreign experts Farmer/clients gradually involve
			Exchange of information among colleagues Selection of candidates	
4	Mobiliza	ation	Practical work according to contracts and assignments Coaching and additional on the job training	NNGO staff with the assistance of foreign experts
5	Final sel	lection	Evaluation of field work	NNGO field staff Farmer/clients Extension candidates
6	Complet	tion of training	Class room training Field/practical training Field coaching and video Exchange of information among colleagues Certificate and registration	NNGO field staff Farmer/clients Local administration
7	Identific candidat	eation of new	Intensive discussions with key resource persons in communities.	NNGO field and supervising staff, farmers and local authorities
8	Independ sion age	dence of exten- nts	Establishment of village offices Contracts with farmers groups	NNGO field staff (backstopping) Farmer/clients Local administration

Monitoring & Evaluation Unit Annually surveyed 75 "AAs" in Agjabedi and Beylagan Parameters: 1) the number of farmer/clients served, 2) the number and type of contracts concluded between AAs and their farmer/clients, 3) the remunerations by farmers for the services rendered (In-kind payments were converted with the market price of the day of payment). 4) Farming knowledge

### Number and value (in Azeri Manat) of written and verbal contracts concluded by 210 private agricultural advisors during 2000 and June 2004 according to the type of clients.

						1		1
No.	No. of		No. of	Value of	No. of	Value of	Total no.	Total value of
of	farmers		written	written	verbal	verbal	of	contracts (in
AAs	s IDP	Local	contracts	contracts	contracts	contracts	contacrts	Manat)
		LUCAI		(Manat)		(Manat)		
24	600	1,480	24	2,247,000	226	4,147,000	250	6,394,000
26	800	1,477	160	12,174,000	314	13,166,000	474	25,340,000
25	400	1,594	395	33,575,000	156	10,878,000	551	44,453,000
20		1,001		00,010,000	100	10,010,000	001	11,100,000
37	346	254	n.a*.	n.a.	n.a.	n.a.	n.a.	n.a.
23	1,041	414	259	25,270,500	246	22,224,500	505	47,495,000
23	515	824	291	18,330,000	172	8,388,000	463	26,718,000
23	515	024	291	10,330,000	172	0,300,000	403	20,710,000
25	150	1,795	371	31,890,000	396	13,666,500	767	45,556,500
27	40	1,455	50	4,639,500	187	12,302,500	237	16,942,000
210	2 002	0.202	1 550	100 106 000	1 607	04 770 E00	2 247	212 000 500
210	3,892	9,293	1,550	128,126,000	1,697	84,772,500	3,247	212,898,500

During the time of writing the exchange rate was 1 USD = 4900 Manat. However, during the observation period, the exchange rate ranged from 1 USD = 3700 Manat in 1999 to 1 USD = 4900 Manat in 2004.

Number of verbal and written contracts of 75 AAs in two intervention regions Agjabedi and Beylagan according to form and value of the contract and the type of payment.

		Agjabedi	Beylagan	Agjabedi	Beylagan	
		Ver	bal	Written		
	0-9 999	255	197	152	216	
ent	10 000-24 999	84	80	5	4	
Cash payment	25 000-49999	34	22	12	20	
sh p;	<u>50 00</u> 0-99 999	14	5	49	31	
Ca	>100 000	4	2	17	24	
		T	<b>-</b>			
	0-9 9 99	266	185	94	82	
nent	10 000-24 999	100	74	9	15	
payr	25 000-49999	14	28	39	70	
In-kind payment	50 00 <mark>0-99 999</mark>	11	16	53	83	
-ul	>100 000	0	3	37	36	

**Results M&E AAs** 

During 2000-2004:

 1) the 210 AAs served 13,185 farmer/clients who concluded 3247 verbal and written contracts. Total Value 43.500 USD.
 2) One AA left (for Russia)
 3) Female AAs less mobility, more household tasks, less income.

### Assessing fee based extension

- Paid extension from onset key in the set-up and concept
- Carefull selection of trainees (on average 3 months)
- High-quality training, coaching, and encouragement
- Demand driven extension



THE MULTI-STAKEHOLDER APPROACH

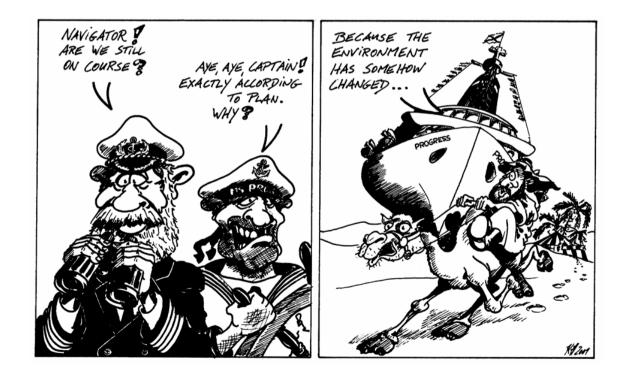
#### Assessing fee based extension

- Support during training and after graduation to establish trust
- Remain with extension (no credit provision, no input supply...)
- No central (expensive) structure but independent, private AAs to keep the fees low
- Qualified and well trained coaching staff



### Assessing fee based extension

- Well functioning M&E unit with a wide spread scope (teachers, farmers, AAs)
- Regular feedback from representatives of the AA before taking major decision on changes



### Outlook

- Establishing network of AAs
- Long term evaluation
- Financial independence of AIM and its further development
- Long-term return to the investment to the extension program
- Linking with other extension providing services.

