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# Community conversations on collective livestock marketing: The case of Doyogena District, Ethiopia

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# Introduction

Livestock, especially sheep, are an important component of rural livelihoods in the mid- and highlands of Ethiopia. Livestock, particularly small ruminants, contribute to food and nutritional security, serve as important sources of livelihoods, as a store of wealth and a source of organic fertilizer.

Marketing is an important component of the small ruminant production systems in Ethiopia (Kocho et al. 2011). Wellorganized livestock marketing plays a crucial role in enhancing the contributions of livestock to the wellbeing of rural communities. Smallholder farmers face many challenges in small ruminant marketing including weak bargaining power, lack of market information, high transaction costs, limited physical accessibility to markets and poor infrastructure, unorganized markets and weak institutional support systems.

Smallholders depend heavily on the oligopsonic and poorly organized rural markets to buy and sell commodities, including small ruminants (Kassie et al. 2019). Livestock markets are usually tedious and ineffective for small ruminant keepers in Ethiopia. According to Kassie et al. (2019), these keepers and traders are penalized due to the low number of small ruminants supplied per household, since they operate individually.

Addressing unorganized market challenges requires collective action. This enables smallholders to achieve economies of scale that increase market performance, volume of sales and the capacity to control market prices in the locality. Rural communities have a long history of informally organizing themselves into groups for mutual assistance, e.g., for funeral services and other social gatherings. Informal groups can contribute to nurturing the experience and mutual trust for establishing formal livestock marketing groups and other collective actions. Benefits of group actions include access to training, market information, credit, input supply and value addition.

Sustainable and mutually beneficial market linkages are required to ensure that farmer group actions are effective and make sustainable supply their livestock produces to the market. It is important to identify the type of linkage required and the level of support that may be necessary.

For smallholder farmers to act collectively, it is important to create awareness and a vision for successful collective action through a participatory engagement process. Farmers will be convinced and motivated to act when they are engaged in joint problem analysis and decision-making processes. A collaborative learning and action process dubbed 'community conversations' was used to engage men and women community members and local partners in the exploration of marketing needs and challenges. The aim was to understand their perceptions about collective action, and identify knowledge gaps in livestock marketing.

Collective marketing is where community members act to search for new buyers and new markets jointly. Collective marketing groups can be described in terms of their basic functions (Kassie 2016).

Community conversations are facilitated dialogues among community members and local partners to explore and analyse knowledge, attitudes and practices (KAP) regarding livestock marketing challenges, plus their needs and the importance of collective action.

The community conversation on collective action in livestock marketing was conducted in Doyogena district, Limusuticho community on 16 April 2021. This community conversation session is part of the participatory farmer training modules developed under the Livestock CRP which addresses smallholder livestock production and marketing challenges in Ethiopia.

# Process and methodology

The community conversation (CC) was conducted in the Livestock CRP's integrated SmaRT-pack intervention site of Doyogena district, in Ethiopia on 16 April 2021. The CC involved 40 farmers, one researcher, four development partners and one site enumerator (data collector). The gender composition of the participants was 61% male and 39% female (Table 1).

Table 1. Number of CC participants

Participant	Number of participants		
	Male	Female	Total
Research partners	Ι	-	I
Development partners	3	I	4
Enumerators	-	I	I
Community members	24	16	40
Total	28	18	46

Source: Own CC data

Prior to the community conversation, a KAP baseline survey on collective action in livestock marketing was conducted with a portion of community conversation participants. After the KAP survey, the team reflected on their observations and insights which helped them get familiarized with the thinking and practices of community members, thus helping them to localize the discussion points for the conversations.

The facilitation team was composed of staff from CGIAR, and those of research and development partners. Local partners were briefed on the facilitation process and the CC module on collective livestock marketing. The team also discussed note-taking strategies and how to open and close the CC session.

#### Opening and introduction

The session began with prayers by the elders. After that, a recap of the previous sessions on animal feeds, forages and animal health was done focusing on recall, knowledge sharing and application. We found promising changes in husbandry practices around feeding, feed collection, barn cleaning, use of safety clothing when handling sick animals, separation of sick animals until recovery, and quarantining newly introduced animals.

To create motivation for the discussion on collective livestock marketing, the CC participants were asked to explain why they keep livestock. The discussion continued until they mentioned income from the sale of animals. This icebreaker set the scene to smoothly start the discussion and motivate community members to actively engage in the dialogue.

Following that, the CC participants were divided into two groups (men and women) and in-depth conversations facilitated on collective actions in livestock marketing. The reason for this was to encourage women's participation and explore gendered perceptions about collective livestock marketing (Lemma et al. 2021). The groups were later

brought together to report their findings in the plenary. Men participants appreciated how knowledgeable the women were during the plenary discussions.

### Intervention site and area description

The intervention was implemented among the Limu-Suticho community of Doyogena, which is one of the districts in the Kembata Tembaro administrative zone in central Ethiopia. It is characterized as a wet highland with suitable agroecology for sheep production but with land shortage and high population density (Annex 2). The area has a good road facility near the main livestock market (Doyogena) which is the district town (Annex 3). In Limmu-Suticho, men and women have a distinct division of labour. Men work on farming while women manage animal feeding and caregiving of lambs and sick animals. The men are responsible for cattle marketing, while women sell livestock products (milk, cheese and eggs) and poultry. Farmers mainly used a village market called Boke.

## Community conversation results

### Men group discussion results

#### Understanding of livestock marketing

Group members were asked to explain what 'market' and 'marketing' meant to them. Participants described a 'market' as a place where there is exchange (selling and buying) of products. They described 'marketing' as the act of exchanging or selling and buying products and inputs.

Participants said that livestock marketing is affected by high price fluctuations and needs market information to make informed decisions. Marketing of cattle, equines and small ruminants requires joint household decision-making as opposed to poultry, livestock products and crop commodities. Participants mentioned problems related to specific location/space in the market as large animals could easily hurt and injure the small ruminants.

#### Access to markets

Group members have access to different markets in Doyogena and neighbouring districts such as Serera, Shinshicho, Fendida, Angecha and Hadero. Most farmers preferred Doyogena market for the selling of sheep and other large animals due to its size and proximity. Most women used Serera market which is a village market and more appropriate for selling animal products (eggs, butter and cheese) and vegetables. Shinshicho market is mainly used for buying cattle, and is preferred by the youth and traders.

Participants identified livestock marketing challenges such as demand seasonality, market price fluctuation and powerful intermediaries. They noted that brokers were usually present in the market and were involved in setting the prices.

Supply of sheep is higher during the festive periods of January, April and September. At this time, prices fluctuate depending on the number of buyers available in the market. When the buyers (collectors/traders) are few, they set lower prices with little competition.

Participants sold their livestock in different ways depending on the type of livestock and purpose for selling. Most male sheep selected for reproduction purposes are sold through collective action via cooperatives using liveweightbased pricing. The remaining sheep and other livestock like cattle, equines, poultry and livestock products are sold individually.

#### Market as a source of disease transmission

As this topic was discussed during the previous community conversation session, group members demonstrated knowledge of the market as a potential source of disease transmission. When they buy new animals or when they return unsold animals, they quarantine them for about two weeks before allowing them to mix with the herd.

#### Marketing needs and challenges

Participants mentioned poor infrastructure as one of the main challenges of livestock marketing. Initially, they did not consider the importance of market infrastructure. However, after further probing, they listed the infrastructure at Doyogena market which has a fence, vet clinic, security and community latrines. But it lacks sheds, a market information centre, water point and feeding trough. Animals usually become exhausted and lose weight due to lack of feeding and watering troughs in the market. A similar study by Zeleke et al. (2020) found that livestock keepers would like to have these facilities, including sheds.

Animals in the market are grouped separately depending on purpose and type. Farmers said each seller stands with his animals and restrains them using ropes. Otherwise, cattle can become agitated or aggressive and hurt the smaller animals. The market is crowded with no suitable facilities, thus forcing farmers to sell their animals quickly at low prices.

Farmers mentioned that sheep with ear tags were less preferred by buyers. Buyers perceived that tagged animals might be controlled by government bodies and feared charges due to the alleged theft.

Another issue discussed was market information. Farmers revealed that market information helps them make pricing decisions. Community members access market information from different sources including traders, friends, relatives, neighbours and self-assessment before trekking their animals. Some participants indicated that they obtain market information from the mass media, mainly through television and radio. The most credible market information sources were relatives and family members. Participants felt that traders and brokers usually exaggerated market information.

The men indicated that they also set the price for their animals before leaving the house by estimating the cost of inputs and expected profit; however, they might sell their animal at a lower price. They deal with a few organized traders. Over the decades, farmers have observed that the price and volume of livestock sold showed increasing trends.

Farmers mentioned that they had limited access to basic business skills training and market-oriented advisory services. They noted that they have been trained on animal production including disease management, sire selection and feeding. However, they had not been trained on effective marketing management. Participants reflected that there were knowledge gaps in the calculation and identification of the costs and benefits in livestock production and marketing activities. This makes it difficult for them to set appropriate market prices.

Asked about if there were costs associated with the marketing of their animals, the men mentioned the only cost is service tax which is paid when exiting the market with unsold or bought animals.

#### Women's market participation and challenges

Men participants explained that women participate in selling poultry and livestock products such as eggs, butter and cheese. They claimed that women are involved in decisions about livestock selling and the management of income. However, most of the participants had the perception that women have better financial planning habits and have the tendency of utilizing money more wisely.

Participants felt that women need assistance in livestock marketing. They mentioned challenges faced by women such as limited market information, financial illiteracy, lack of confidence in price negotiations and lack of physical strength to manage large animals. The participants pointed out that women can be easily deceived by traders because they cannot count money properly. For example, during replacement of the Birr currency notes, one woman sold chicken at 300 Birr, but accepted 30 Birr instead because she failed to differentiate between the old 100 Birr and new 10 Birr bills. Some women cannot count money so they require assistance from a male family member. In addition, due to their limited mobility and exposure, women fear facing new people. They might lack the confidence to negotiate, so buyers take advantage of this and buy the products at unfairly low prices. Women also need male assistance in trekking animals to markets.

#### Community experience in group actions and perceptions towards collective marketing

Informal groups play a key role in many aspects of social capital and people's livelihoods. Community members identified different informal groups such as traditional labour-sharing arrangements dubbed 'Debo', a traditional resource sharing arrangement for funerals and weddings known as '*Idir*,' and savings for festive periods and other risks called 'Equib'. Regarding membership of these informal groups, both men and women are members, but the leadership mainly comprises male members.

Through the discussion of their experiences in local groups, farmers came up with the idea for collective action in livestock marketing. They explained that they could extend their informal group experiences to form livestock marketing groups.

### Women group discussion results

#### Understanding of livestock marketing

The women explained that a market is a place where exchange of products occurs. They mentioned the purposes of selling livestock, e.g., for construction of housing, children's education and to meet other cash requirements. They usually made a decision to sell when their animals aged, were no longer productive or when there is need to replace the animals. They usually sold animals during the festive periods of December, April and September.

Due to their workload, women preferred nearby markets such as Doyogena and Fendide. Their choice of markets is also based on purpose. They mentioned that Doyogena and Angecha markets are used for selling livestock, while Fendide and Shinshicho for buying animals. They sell animals in accessible markets often frequented by traders and buy animals in village markets where there are no traders and prices are lower.

Women demonstrated knowledge of the market as a source of disease transmission. They therefore, quarantine the livestock from markets for a few days to first observe their movement, feed intake and body conditions.

#### Marketing needs and challenges

Participants explained that apart from fencing, the Doyogena livestock market lacks other facilities. Based on purpose and type of animals, there are separate markets for fattened lambs, ewes, milking cows, oxen and equines.

Upon further discussion, women participants recognized the importance of basic market infrastructure such as sheds, watering and feeding troughs, vet services, security, a market information centre and restrooms.

#### Access to market information

When asked to explain what market information means to them, the women mentioned price. Upon further discussion, they recognized that market information also includes the type of markets, volume of products, quality of products, types of buyers and conditions for payment. They realized that market information is important in decision-making. The participants access most of their market information from other farmers or traders and through self-assessment. They considered market information from farmers credible.

When asked about access to basic business skills training, the women mentioned that market-oriented training and advisory services were lacking. They lacked the capacity to make marketing decisions based on calculation of production costs and profit margins.

#### Marketing costs

In marketing of livestock, women incurred costs such as transport or labour costs for trekking, meals and service charge.

When asked what market linkage means to them and why it is important, they demonstrated limited knowledge. With more examples and further probing, they understood what it means, why it is important and how it can be achieved. Participants explained the lack of market linkage facilitations and supports from the service supplier institutes

#### Women's participation in livestock marketing

Women often sell sheep, goats and poultry, and animal products such as eggs, cheese and butter. Cattle and equines are mainly sold by men. Women also participate in marketing of cattle, but never in equine marketing.

Women reported participating in decision-making about livestock sales and income management. However, this could disguise real decision-making by women. Some women members reported having joint bank accounts. They also claimed to have better income management.

#### Community experience in informal group actions and perceptions towards collective marketing

Informal groups mentioned by the women include savings groups known as 'Equb', mutual assistance groups called 'Edir', and labour-sharing groups locally known as 'Debo'. While discussing membership and leadership of informal groups, women participants explained that there were both single-sex and mixed-sex groups. Considering the advantages of membership composition, the women preferred mixed-sex groups. However, men held leadership roles even in women-only groups.

Women group members felt that they could extend informal group experiences to tackle the problems of unorganized marketing. They have now started selling rams using live weight and appreciated this standardized marketing system. They highlighted some of the benefits of collective action in marketing: ability to negotiate better prices and manage the animals.

### Reflections on the plenary session

In the plenary, note-takers shared results from the two groups. There was some excitement among the participants when both groups presented their results with solutions and the importance of collective action in livestock marketing. The men were impressed by the findings of the women.

# Analysis, knowledge gaps and key messages

### Analysis and knowledge gaps

The community conversations demonstrated knowledge gaps of community members in collective action in livestock marketing. In both male and female groups, participants identified only nearby markets, had limited access to knowledge about market information and lacked basic knowledge on how to make market price determinations based on production costs. While both groups appreciated collective action in livestock marketing, they were unable to identify functions of collective marketing groups, the opportunities that they offer and the challenges they would pose. In general, they lacked knowledge on the benefits and process of cooperation.

The facilitators introduced new knowledge around the components of the marketing mix, i.e., product, place, price and promotion. They discussed product quality, volume and type, and how this influences the marketing ability of community members as different buyers have different requirements. They also discussed the role of product promotion and product distribution.

They highlighted the fact that promotion plays a major role in attracting new buyers. Collective action is critical in promoting smallholder products in terms of quality, nature, feed items, age and production practices.

Participants were informed that critical decisions need to be made in livestock marketing regarding the time of sale to avoid additional costs of feed, labour and health management. Collective action would help the community to plan and act together, and improve basic marketing facilities and services.

### Key messages, community actions and reflections

#### Key messages:

- Market linkage facilitation plays a key role in improving market access (new buyers, markets, customers).
- Collective action empowers small ruminant producers to better deal with price negotiation, attract customers, improve marketing facilities and services, and increase access to production inputs.
- Collective action helps address unorganized marketing problems such as low product volumes, limited access to market information, few traders, limited market access and limited price negotiation capacity.
- Collective livestock marketing actions require coordinated and committed actions by group members and support actors.

#### Success factors for marketing groups:

- Financial resources (start-up share, loan/credit)
- Capacity development training (feeding, breeding, and marketing skill development, cooperative organization)
- Technical support and follow up by local partners
- Access to inputs and services (improved forage seeds and feed processing units, veterinary services such as technical advice, drugs/vaccines/deworming).

#### Community actions

- I Share information and knowledge from the community conversation with other members of the cooperative.
- 2 Improve women's decision-making in livestock marketing and income management.
- 3 Strengthen collective action in livestock marketing
- 4 Form union of Community based breeding programes
- 5 Promote and create awareness about research-supported sheep production.

#### Reflections and follow-up strategies

At the close of the community conversation session, a few community members were requested to reflect on their key learnings and experiences. First, they thanked the team for such an engaging learning experience and expressed their appreciation to the development partners. They noted that the conversations had opened up communication channels between local service providers and community members.

The partners appreciated the approach as it was new and innovative. The approach motivates the community to explain more and identify their gaps and strengths easily. They committed to follow-up and support the implementation of community action plans.

### Lessons learned and recommendations

Livestock marketing in the district is underdeveloped, and there are capacity gaps both at the community and partner levels. The community conversations created space for community members and local partners to jointly explore perceptions and practices about unorganized livestock marketing and how collective action could help address these challenges.

Practical training for partners in market-oriented extension and advisory services is critical. In addition, they require skills-based training in community mobilization, market linkages facilitation, and participatory engagement to advise farmers on market-oriented production planning.

### References

Kassie, G.T. 2016. Ethiopian small ruminant keepers trained in 'smart' collective marketing.

https://livestockfish.cgiar.org/2016/12/26/ethiopia-smart-marketing/

- Kassie, G.T., Wubie, R.S., Tokgoz, S., Majeed, F., Yitayih, M. and Rischkowsky, B. 2019. Policy-induced price distortions along the small ruminant value chains in Ethiopia. *Journal of Agribusiness in Developing and Emerging Economies*.
- Kocho, T., Abebe, G., Tegegne, A. and Gebremedhin, B. 2011. Marketing value-chain of smallholder sheep and goats in crop-livestock mixed farming system of Alaba, Southern Ethiopia. *Small Ruminant Research* 96(2-3): 101-105.
- Lemma, M., Tigabie, A. and Mekonnen, M. 2021. Community conversations transform gender relations in rural Ethiopia. https://livestock.cgiar.org/news/community-conversations-contribute-transform-gender-relations-rural-ethiopia\_
- Zeleke, F., Kassie, G.T., Haji, J and Legesse, B. 2020. Preference and willingness to pay for small ruminant market facilities in the central highlands of Ethiopia. *Journal of International Food & Agribusiness Marketing*. DOI: <u>10.1080/08974438.2020.1838385</u>

### Annexes

# Annex I.CC facilitation checklist on collective livestock marketing

#### Livestock marketing practices

- The concept of livestock marketing What do the terms 'market' and 'livestock marketing' mean to you?
- Access to markets Why, where, when and how do you sell and buy livestock (mainly cattle, sheep and poultry)?
- The market as a source of disease transmission Do you quarantine new animals from markets for some time? If yes, why and for how long?
- Marketing needs and challenges
  - Market infrastructure Market shed, watering and feeding trough, vet services, security, market information centre, restrooms, etc.
  - Access to market information What, where, how, credibility?
  - Marketing costs Service charge, transport
  - Market prices Low, fluctuation, brokers, desperate selling, negotiations, trends
  - Market linkage facilitation Type, facilitator, how, influence, evaluation, need

#### Women's market participation

- · How are decisions on livestock marketing made in your household?
- Who sells animals in markets and which animals or animal products? Why?
- Factors influencing women's participation in livestock marketing Confidence/bargaining skills, financial literacy, type of animal species, market facility, purpose of buyer, access to market information, men's fear of loss of authority
- Who controls or makes decisions on the money earned from sale of livestock or animal products? Does this differ by animal species? Why?

#### Community experience in group actions and perceptions towards collective marketing

- Experience in collective actions What informal or formal groups exist in this community?
  - Membership
  - Leadership
  - Benefits
  - Challenges
- Perceptions towards group marketing practices
  - Problems of unorganized marketing

- Past experience in group livestock marketing
- The conception of marketing groups what, why, how, functions?
- Benefits and challenges of group marketing
- Opportunities (felt need and driving factors) for establishing marketing groups
- Gender composition of marketing groups single-sex or mixed groups? Why?

Demand generation for collective marketing: introducing new knowledge

- Opportunities and success factors for group marketing
  - What is a market? The four market components
  - What is marketing? What does it involve?
  - Marketing challenges of smallholder farmers
  - Benefits of and opportunities for collective marketing actions
  - · Requirements and process of establishing livestock production and marketing cooperatives
  - · Leadership and management requirements of marketing groups
  - Success factors for livestock production and marketing groups
  - · Market facilitation and capacity development support for livestock marketing groups

Key learning points, messages and action plans

- Learning integration and key messages
- · Community action plans to establish collective actions in livestock marketing
- Reflections: community members, cooperative/marketing experts

### Annex 2. Socioeconomic data on Doyogena

a Total coverage, total population and agro-ecology

No	Item	Measurements	Remark
I	Total area coverage	17,263.89 ha	
2	Average altitude	2585 m	
3	Agroecology		
	• Highland	70%	
	• Midland	30%	
4	Average temperature	22°C	
5	Rainfall		
	• Maximum	25 mm	
	• Medium	12.5 mm	
6	Location		
	• From Addis Ababa	• 258 km	
	• From Hawassa	• 171 km	
	From Durame (Zone)	• 67 km	
7	Boundaries/borders		Angecha and Kecha Bira are
	From Eastern part	Angecha woreda (zonal)	districts within Kembata Tambaro
	From Western part	• Hadiya zone	zone
	From Northern part	• Hadiya zone	
	From Southern part	• Kacha bira woreda (zonal)	
8	Total population		
	• Male	• 62,593	
	Female	• 66,943	
9	Major livelihoods in the district	Crop cultivation	
		Livestock production	
		• Handicrafts	
10	Major problems	Land shortage	
		Unemployment	

#### b Land use pattern

#	Land use type	Total coverage (ha)	Remark
1	Annual crops	9058.6	
2	Perennial crops	895.6	
3	Grazing land (communal + private)	1097	
4	Forest land		
	Natural forest	3.5	
	Cooperative forest	47.5	
	Government forest	98.25	
	Private forest	3272	
5	Total cultivated land	9954.2	
6	Cultivable land (in future)	14,678.58	
7	Uncultivable (idle)	2585	
8	Other	106	

#### c Livestock population

#	Livestock type	Total number	Remarks
I	Cattle	955,924	
2	Sheep	118,425	
3	Goats	6760	
4	Chickens	62,418	
5	Horses	2235	
6	Mules	387	
7	Donkeys	8780	

#### d Agricultural development works

#	Service/works	Number Remark		Remark
I	Agricultural development workers	Male	51	
		Female	21	
2	Extension service getting households	Male-headed	9241	
		Female-headed	1914	
3	FTCs (Farmer training centres)	I4 (one FTC per ket	oele)	
4	Livestock resource development service			
	Animal health officers	Male	15	
		Female	I	
	Animal health clinic	1		
	Animal health centre	13		
	Butchery	1		
	Metal crash	2		
	Wood crash	7		

### Annex 3. Socioeconomic data for Limu Suticho

a Total coverage, total population and agro-ecology

- Kebele coverage: 1532.22 ha
- Perennial crop coverage: 396 ha
- Annual crop coverage: 860 ha (wheat, barley, potato, faba bean, field pea and vegetables like cabbage, beetroot, carrot, onion and garlic)
- Manmade forest land: 68 ha
- Grazing land (communal + private) and forage cultivation: 165.5 ha
- Public service institutions: 4.5 ha
- Religious institutions: 18 ha
- Others: 20.22 ha

#### Topography, agro-ecology

- Flat: 15%
- Slopy swampy: 85%
- Annual rainfall: 1800 mm
- Altitude: 2575 masl
- Temperature: I4°C

#### Total population of Lemi Suticho kebele

- Total population: 6930 (Male = 3406 & Female = 3524)
- Total farm households: 789 (Male-headed = 649 & Female-headed = 140

#### Livestock type and population

- Cattle: 6793 (Local breed = 2443 & Improved = 4350) i.e. about 64% of the total cattle population is improved group.
- Equines: 1147 (Mule = 12, Horse = 125 & Donkey = 1010)
- Small ruminants: 2744 (Sheep = 2666 + Goat = 78); 456 sheep population is from cooperative members.
- Poultry: 13,753 (Local breed = 2750 + Improved = 11,002)

Main livelihood: Crop and livestock production

# Annex 4. List of participants

#### Local partners

Name	Sex	Affiliation
Negash Desta	М	Livestock and fishery office head
Zeleke Orebo	М	Marketing expert
Degefe Darego	М	Cooperative promotion expert
Desalech Markos	F	Site data collector
Tesema Erchafo	М	Socioeconomics researcher
Kibnesh Yohanes	F	Kebele Development agent

#### Community members

#	Name	Sex
#	Estarike Bekele	F
2	Ayele Abuye	M
3	Alemitu Tamire	F
4	Abonesh Temesgen	F
5	Mulu Desta	F
6	Tekalign Tesfaye	M
7	Kebebush Abera	F
8	Abote Forecha	M
9	Sugame Abute	M
10	Dobe Bafa	M
11	Adise Chafamo	M
12	Lema Orebo	M
13	Bekele Wongelo	M
14	Ayele Awno	M
15	Melesech Andemo	F
16	Ayelech Tesema	F
17	, Belaynesh Maru	F
18	Genet Tadiwos	F
19	Lapiso Gurmiso	M
20	Lema Achiso	Μ
21	Desta Menta	Μ
22	Bekele Shambo	Μ
23	Tagese Landore	Μ
24	Daniel Yirgete	М
25	Asefa Adise	Μ
26	Desalech Bekele	F
27	Meselech Haile	F
28	Tesema Yenore	М
29	Degefea Tekile	М
30	Fikre Legese	М
31	Abebech Chafamo	F
32	Ayelech Siyum	F
33	Desalech G/Hana	F
34	Mulunesh Embore	F
35	Abebech Shamebo	F

#	Name	Sex
36	Tseganesh Tesema	F
37	Lemam Wondimu	Μ
38	Workinesh Gugisa	F
39	Asefa Gadiso	Μ
40	Tesema Yenore	Μ