

Assessment of Marketing and Challenges of Goat Production in Zala Woreda, Gamo Gofa Zone, Ethiopia

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Abstract

The study was conducted in Zala district with the objective of assessing marketing and challenges of goat production. Formal types of survey were used on 90 respondents to collect data through structured questionnaires. Goat marketing systems in the study area were eye ball estimation (50%), live weigh basis (13.33%), broker (11.11%) and by buyers and sellers' agreement (25.56%). Goat production is the major means of livelihood for the farmers in the study area. However, the production problems were disease or health problem (34.5%), feed shortage (13.3%), poor quality of goat, (22%), poor of extension services (10%), water shortage (8%), lack of credit services (7.8%) and poor market information (4.4%) are the major important constraints of goat production in the study area. It was concluded that it need good extension and credit services and other improved breed of goat has vital role for production in the study area.

Keywords: constraints, marketing, goat

1. Introduction

Goat population is immense in Ethiopia's estimated at 22.6million heads (CSA, 2012). It is found widely distributed across the different agro-ecological zones of the country (EARO, 2000). Goats are owned by smallholder farmers as an integral part of the livestock sub-sector (Tekelye and Kasali, 1992) and contribute to both subsistence and cash income generation (EARO, 2000).

Goats have been the most rapidly expanding livestock subsector for more than 20 years. The world goat population has increased by about 66 percent over the past 20 years, compared with 14 percent growth for cattle (FAOSTAT, 2013). However, most of this growth has occurred in low-income countries (which account for about 80 percent of the world's goats), and most of the goat milk or meat produced is for own consumption on farms, with a very small share traded – probably less than 5 percent (Dubeuf *et al.*, 2004).

According to Fikru S and Gebeyew K (2015) funding feed shortage were limiting constraint in goat production in the study area. Feed shortage in both seasons (dry and wet) limits productivity of goats and it was further worsened due to the absence of awareness and practice of feed conservation techniques. According to Girma D *et al.* (2013) funding majority of the producers were indicated as disease was the major health problem of small goat production in Adami Tulu Jido kombolcha district of East Shawa Zone. About

Zala district is one of immense goat producers. However, there are different challenges of goat production in the district. There are small-scale livestock keepers to engage in commercial production that would fill the void in the market left by the reduction in the number of commercial livestock farmers by different factors. There have also been changes in the market demand due to production problems. Therefore the current study is to evaluate marketing and challenges of goat production in Zala district of Gamo Gofa Zone.

2. Materials and Method

2.1. Description of the study area

The study was conducted in Zala district which is found in Gamo-Gofa zone in South Nation Nationality and Peoples region of Ethiopia. The district is located 510 km from south of Addis Ababa, 284 km from East-West of Hawassa and 240 km from South west of Arba-Minch. It located between 06° 04'00 N to 06° 30' 00 N latitude and -36° 58' 20 E 37° 13'30 E longitude. The mean annual temperature and humidity on average ranges 18°C – 32°C and 10%–90% respectively. The annual rainfall in district ranges from 900 mm 1700mm and the altitude ranging from 907-2040 m.a.s.l. The district has 36 kebeles and from that 96% low land and 4% mid land. The low land area was the most important and high number of goat population (Zala district livestock and rural development office, 2017).

2.2. Sampling techniques and sample size

The district has 36 kebeles out of which six kebeles were selected purposive sampling methods based on goat population and accessibility. Five kebeles from lowland and one Kebele from midland were selected purposely. From each of the selected Kebeles, 15 representative household were selected randomly. Thus, a total of 90 households were interviewed from all study sites.

2.3. Data collection

Both primary and secondary data sources were used. The primary data was collected from sampled respondents

through structured questionnaire and interviews with key informants. The questionnaire was designed to capture information such as marketing system and challenge of goat production in the study area. Secondary data was collected from different literature materials and from Zala district animal and fishery resource development office.

2.4. Data analysis

The collected data was analysed and summarized by using descriptive statistics like percentage and frequency and presented in Table.

3. Result and discussion

3.1. Marketing of goat

The marketing of goat in the study area were considered at lower level due to the different constraints affected the goat production. The production was poor in the same away marketing too. So that to increase marketing facility requires the other constraints affecting goat production based on improving or and managing disease, quality, lack of credit services, feed, lack of extension services and grazing land was prior to market value. However, the marketing quality of goat affected by further quality of goat such as color of the goat, height, body size (fatness), pregnancy and young or oldness of goat. In generally, goat marketing quality due to price attractive color of goat at young stage gets good price in market in whole study area.

The majority of the goat producers, about 50% of market their animals on 'eye-ball' estimation. The other of 25.56% prefer to sale by 'buyers and sellers agreement', 13.33% of goat preferred to sale by 'live weight basis' and also 11.11% preferred to sale by 'broker' for it fetches their prices (Table 1). Goats marketed on live weight basis are only young male animals required by the export. Goat producers of 50% prefer 'eye-ball' marketing for it fetches lower prices and majority of their customers purchases on 'by buyers and sellers agreement. Goats were marketed on individual basis and agreement to prices reached after a long one-to-one bargaining between buyers and sellers sometimes brokers and live weight basis. Tsedeke (2007) reported that majority of the producers, about 96.7% market their animals on 'eye-ball' estimation and few farmers (2.0%) prefer to sale on live weight basis for it fetches better prices.

The local and terminal traders and export agents are better market information of the demands and prices of goats and are decisive to fix prices. These excess demands and raised purchases tend to shoots-up sale prices and this in turn motivates local farmers to sale as many animals as possible; affecting household flock production through the removal of young breeding flocks. This is in agreement to Workneh (2006) reported that the current market prices may offer greater incentives in the short-term than the longer-term advantages of retaining inputs for breeding and this place serious concern to the present sudden surge of the rising off-take on supplies of replacement breeding stock.

Table1. Marketing system of goat in the study area

Parameters	Respondents	Percentages
Eye ball estimation	45	50%
Live weigh basis	12	13.33%
Broker	10	11.11%
By buyers and sellers agreement	23	25.56%
Total	90	100

3.2. Challenge of goat production

Major challenges of impeding the performances of goats of smallholder farmers identified were diseases and predators, water shortage, feed shortage, drought, lack of credit services, lack of extension support and poor quality of goat (Table 2). These environmental influences do not allow the potential of the goats to be fully expressed in the study area.

Most of total flock owners in all the study sites reported that diseases and parasites are overriding problems in goat production. This clearly depict that it is a major cross-cutting impediment to the flock production. Considerable flock owners, 50% reported that the occurrence of morbidity and mortality to their flocks. In addition, the respondents mentioned that diseases and parasites contributing 20 % of the total flock loss is the largest single factor to the immense flock mortality. This is agreement with Tsedeke (2007). The effect of morbidity on productive and reproductive performances of the flocks is also apparently higher. Limited capacity and coverage of the existing public veterinary institution to serve the broad geographical area and vast livestock population in the district further worsen consequence of diseases and parasites. The poorest ratio of veterinarian and Animal Health Technicians to high number of Kebeles and vast livestock population in the area put goat disease prevention and control efforts at low level.

About 35.55 % of respondents were reported disease were a common problem for all the six Kebeles

particularly during the dry seasons. It was indicated that disease was declining as many goats in the study area. However, the average mortality rate in all stocks of goat in the past 12 months was higher. The result obtained through farm monitoring survey also revealed the presence of high mortality in the area. The average mortality rate in all stocks of goats obtained in the area of the present study is close to high (Jemal, 2008). Relatively high disease and parasite infestation of goats is common in low lands probably due to the presence of communal and fallow-grazing lands and movement of animals is also common from place to place in these areas (Tessemaet *et al.*, 2003).

Table: 1. Major constraints of goat production in the study area

Major challenge of goat	Respondent	Percentage	Rank
Poor of market information	4	4.44	7
Lack of credit services	7	7.78	6
Poor quality of goat	18	20	2
Poor extension services	9	10	4
Water shortage	8	8.89	5
Feed shortage	12	13.34	3
Disease	32	35.55	1
Total	90	100	

Grazing land size is diminishing due to cropping encroachment and land re-distribution, putting nutritional stress on livestock in general and goats in particular. Tethering pressure and insufficient nutrition are often responsible for the appearance of prolonged anoestrous and silent estrous periods, a reduction in fertility, prolonged parturition interval and reduction in prolificacy. Furthermore, the situation of inadequate quantity and quality of feed and nutrition reported by respondents across the study sites. About one quarter percent respondents both mixed flock in goat dominating site face difficulty of providing adequate and quality feeds to their goat. In the study area, most of goat feed scarcity season was ranked, first winter (44.44%), second autumn (33.33%), third spring (13.33%) and fourth summer (8.9%).

Water provision is generally poor in the district, mainly in goat dominating site. About 15% of the total respondents mentioned that the recurrent drought is major ground to the feed and water scarcity. As a result, flocks are trekking over long distances losing energy which otherwise would have been used for growth, reproduction or milk production. Watering frequency affect the daily feed intake of goats and lead to reduced productivity. Female animals, particularly milking goats were in a stressed condition and reported abortions and milk reduction was associated with water shortage and drought. Fetching dirty water for human and livestock consumption leads for water borne diseases and has a big implication on human and livestock productivity

About 20% of respondents reported that poor qualities of goat breed were reared and lack market-oriented goat production. This is more noticeable in mixed flock of goats control Kebeles that have better market access and limited land holdings. Technological inputs to mitigate the clear and present danger of flock health and nutrition are critical requisite. Lack of capital to build flock holding and purchase production inputs (largely health and feeding) is among limiting factor for about 12.5% of the total respondents.

On the other hand, 10% of respondents condemned that the current extension system is providing them little support to enable them expand their flock production. It is anticipated that the extension service system could impartially support the farming activities that uphold the livelihood of the smallholder farmers. Goat are providing an evident contribution through income, food, manure, saving and social and cultural functions. However, the current extension system in the district was undergoing insignificant intervention towards addressing the identified bottlenecks.

4. Conclusion

The study was conducted in Zala district for objective of assessing smallholder challenge of goat production and marketing. Goat marketing system in the study area were eye ball estimation, live weigh basis, broker and by buyers and sellers agreement. On the other hand, goat production constraints in the study area were disease, feed shortage, water shortage, poor quality of goat, lack of good management activities, and lack availability of credit and extension support. Generally, it can be concluded that it need good extension and credit services and the other improved goat has vital role for goat production in the study area.

Based on the above conclusion, the following recommendations were forwarded:

- Training has to be given for producer in the area in husbandry practices
- Make use of potential opportunities of large available land area and unproductive farmland,
- Capacity building and knowledge for management of goat production, joint learning and action so that sense of ownership gradually develops among stakeholders and
- There has to be value chain in marketing of goat.
- The farmers should give emphasis for this sector to be profitable
- The dissemination of improved goat was strongly needed to improve production and productivity.

- Veterinary services should be strengthened in the study area.
- Much work to be done to alleviate on major problems and to meet optimum level of production, improving health care and providing credit to solve shortage of capital.
- Moreover, further studies are needed based on improved goat production system in the study area.

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