

RESEARCH PAPER

Profitability and Socio-Economic Upliftment of Small-scale Goat Farmers in Mymensingh District of Bangladesh

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ABSTRACT

A survey was conducted in Khagdahar Union of Mymensingh district of Bangladesh to determine the socioeconomic profile of goat farmers, goat management techniques, and the profitability of small scale goat farming. The study integrated randomly chosen sixty goat-raising farmers from three villages. According to the findings, the majority of the farmers in the research area (80%) raised Black Bengal goats in a semi-intensive method. The majority of farmers (52%) constructed tin-shade homes for their goats without considering adequate ventilation (63%). The goat farmers of the study area were predominantly middle-aged (48%), illiterate (60%), female (90%), and had a medium-sized family (60%). The majority of the farmers were landless (80%) and had started farming with their own money (53%). About half of the farmers (52%) used supplement feeding with grazing, preferring roadside grazing systems (87%) as a fodder source, and only fed wheat bran to goats (52%) as a concentrate. Skin disease is the most common ailment, accounted for 63%. The majority of the farmers only had a rudimentary understanding of the disease, and only 16.7% of them followed to a regular vaccination schedule. Marginal farms had the highest net profit per goat (BDT 3168), followed by landless (BDT. 3028), while small goat flock owners had the lowest net profit per goat (BDT. 2589). The survey also discovered that goat producers were having some serious challenges with their herds. If these issues could be resolved, the goat farms would be able to generate more money than they currently do.

Key words: Goat farming, Mymensingh, Profitability, Socioeconomic Condition

Introduction

Goats are small livestock animals known as the "poor man's cow" for their significant contribution to the poor man's economy. Goats require less feed than cattle and are typically kept in rural areas on tree leaves, twigs, and bushes. Goats have been a part of rural farm homes since the dawn of civilization, and because of their docile character, women and children can easily handle them in addition to their usual labor. About 26.6 million goat heads (DLS, 2021) are spread over the country, with about 90% (Banglapedia, 2021) being kept by rural people, largely women, following a traditional scavenging system with 2-5 goats per farmer. Black Bengal goats, which are renowned for their prolificacy, fertility, early sexual maturation, and adaptation to the hot-humid environment, account for more than 90% of the goats raised in Bangladesh. The Jamunapari, boar, and other crossbred goats are among the rest (Banglapedia, 2021). Goats are valued for their

contribution to Bangladesh's national economy because of: (i) meat for human consumption (ii) skin for earning foreign currency regardless of goat type; (iii) increased income and poverty reduction for smallholders; (iv) employment generation in rural areas; and (v) cash income for women's empowerment.

Among the animal protein sources, goat (chevon) meat is popular among Bangladeshi people, regardless of religious affiliation or caste identification. Goat meat is in high demand all year, but especially during Eid-ul-Azha and other religious holidays. Goats produce 23% of the country's milk and 27% of the country's meat, totaling 450 thousand metric tons of milk and 105 thousand metric tons of meat, respectively (Rahman *et al.*, 2017). Mutton consumption has increased by 23% in metropolitan areas (DLS, 2016). Bangladesh produces roughly 220 million square feet of leather, with goat skins accounting for 32.74 %, mostly from Black Bengal

goats (Export Promotion Bureau, 2014). The Black Bengal goat's skin, in particular, is prized all over the world (Banerjee 1980). In FY 2018-2019, total leather and leather goods export earnings were 2.52 % of overall export earnings (Rakib, 2020).

In Bangladesh, approximately 29.4 % of the population lives in poverty (BBS, 2020). Goats are a good investment for the impoverished. It is a significant part of the livelihood of a huge number of small farmers, notably women, landless and marginal farmers who live in geographically isolated places and have few other alternatives (Choudhury *et al.*, 2012). According to the technology package "Goat rearing model for landless and small farmers" created by Bangladesh Livestock Research Institute (BLRI), one female goat farmer can earn an additional BDT. 1455 per year. As per a recent BLRI research titled "National program on poverty reduction through goat production," a goat farm with five does can yield roughly Tk. 7,000–12,000 per year (from the second year) (Rahman *et al.*, 2017). The status of women and the socioeconomic progress of any country are inextricably linked. Improving the status of women is a precondition for the country's balanced socioeconomic development. This can only be accomplished if more women participate in development initiatives, and goat farming can be a good way to do so. From the explanation above, it is evident that goats are the second most popular livestock in Bangladesh, after cows, which are likely raised for a variety of purposes including meat, hides, milk, and manure. It has made a significant contribution to alleviating the protein gap in human nutrition while also serving as the primary source of income for Bangladeshi farmers. The goat business frequently assists farmers in overcoming an unforeseen problem that necessitates fast funding. Appropriate intervention is critical for improved goat productivity and marketing. To attain these goals, information about the current goat production and management system is required. There is currently very little information available regarding the current state of the farmers and their management practices. The study's goals are to look at the socioeconomic conditions of goat farmers in Mymensingh and determine the profitability of small-scale goat farming. The results of the study will be used to analyze goat producers' needs and to suggest management measures to boost goat productivity.

Materials and methods

Study area

The research was carried out in three villages in the Khagdahar union, Sadar upazila, Mymensingh district: Khagdahar, Bagerkanda, and Kalikapur. The Mymensingh division is situated between the latitudes of 24°44' and 36.4128' north and the longitudes of 90°23' and 54.1824' east. The selection of the study area is a crucial phase in a farm management research. Accordingly to Yang (1962), "the area in which a farm business survey is to be conducted relies on the particular purpose of the survey and possible cooperation from the farmers and other respondents". A preliminary survey was done in three villages to meet the study's goals. Most of the inhabitants in these villages work in

agriculture, while the majority of the women in these villages work in goat husbandry.

Design of the survey

With the use of a pre-designed structured questionnaire, the study was undertaken to find various information relevant to socio-economic situations. Using a basic random selection technique, 60 farmers from three villages (20 farmers from each village) were interviewed. The Upazila agriculture office provided detailed information on the goat farmers. The formal survey, on the other hand, took place in March and April of 2021.

Data collection

The structured interview schedule was meticulously planned with the study's goals in mind. The responders could easily grasp the questions and statements in the schedule since they were basic, direct, and straightforward. Farm survey data can be collected using three different approaches. The three methods are: i) direct observation, ii) interviewing respondents, and iii) keeping records. All three strategies were used in this investigation to acquire the essential data.

The purpose of the study was clearly conveyed to the respondents prior to data collection. Farmers' sex and age, education, farm size, social standing, management cost, land, and household size were all gathered, as well as certain data related to goat rearing, such as breed, source of funds, feeding and nutrition, source of feed, de-worming, veterinarian treatment, disease prevalence, and so on. Some data, such as goat shed conditions, was gathered through eye observation of the farm and the shed. Secondary sources included government records, related literature, books, journals, newspapers, articles, theses, and websites, among others.

Data analysis technique

To get the relevant and related information, both primary and secondary data were reviewed, validated, and thoroughly revised after collection. To extract the relevant findings, the collected data was categorized, tabulated, and evaluated in accordance with the study's objectives. Because it was easy to calculate, frequently utilized, and understand, the data was mostly examined and presented in tabular form. With the help of MS-Excel-2010, the tabular analysis was mostly based on some statistical measures such as averages, percentages, and so on.

Results and discussion

Breeds of goat and management system

According to the survey, around 80% of the farmers in the research area raised Black Bengal goats, 5% raised Jamunapari goats, and the remaining 15% raised various crossbreeds of goats (Table 1). The majority of landless farmers in Khagdahar union opted to construct their farm sheds using natural materials such as bamboo, wood, or occasionally coconut and straw for the roof. Some of the sheds were constructed of mud and earth. Some farmers put their goats under their beds in the same rooms where they slept. Table 1 shows the housing management of goats in the study region, where it was discovered that the majority of the sheds were composed of tin (51.7%), bamboo-straw (20%), earth, and other materials (15%). For nighttime shelter, almost 13% of the farmers kept their goats under their mattresses. Only 28% of homes

provided appropriate ventilation for their goats, while the rest had poor (63%) or no ventilation (8%) (Table 1). It resulted in a high number of illness outbreaks on the farm. They failed to maintain enough ventilation in the shed due to a lack of proper housing design, despite the fact that it is critical for goat comfort. It is critical to keep the house clean on a regular basis, to maintain the goats' health, to reduce the use of expensive drugs, and to confer with veterinary professionals. Unhealthy and sick goats are less profitable, and they may die as a result of a lack of immunity and other diseases. Adequate immunization and regular shed cleaning, as well as proper hygiene management, can solve the problem (Peacock, 1996). According to the survey, over 90% of households clean their goat houses on a regular

Table 1. Breed and goat management system (n=60)

Parameter	Category	Respondents	Percentage (%)
Breed	Black Bengal goat	48	80.0
	Jamunapari	3	5.0
	Crossbred	9	15.0
Housing system	Tin-shed	31	51.7
	Bamboo-straw made	12	20.0
	Soil and others made	9	15.0
	under farmers' bed	8	13.3
Ventilation	Sufficient	17	28.3
	Insufficient	38	63.3
	Not at all	5	8.3
House cleaning	Yes	54	90.0
	No	6	10.0
Rearing system	Extensive	0	0
	Semi intensive	60	100
	Intensive	0	0

Respondents' Socioeconomic characteristics

Age, gender, educational level, family size, occupation, farm size, and investment source are all socioeconomic factors taken into account. Farmers' socioeconomic characteristics have a significant impact on production planning and decision making.

Age and gender

According to our study (Table 2), the majority of goat farmers (48%) were middle-aged, ranging in age from 36 to 50 years, followed by young age (up to 35 years) and old age (20.0 percent). Islam *et al.* (2018) reported that the majority of goat farmers were in the middle age group, followed by senior farmers and young farmers, which is partially consistent with our findings. According to Tanwar *et al.* (2008), the majority of people in Rajasthan's over-60 age group prefer goat farming since goats are easy to manage. In terms of the gender divide, in the study area 90% of females and only 10% of males were involved in goat rearing.

Educational level

One of the most essential socioeconomic determinants influencing the general pattern of a better lifestyle is education. In general, a farmer with a higher degree of education has greater potential than one with a lesser level of education, particularly in situations requiring more technical expertise. About 60% of the farmers in the study area were illiterate or could only sign their names. They claim that no formal education is required for goat farming or any other agricultural operation. Formal education in terms of primary, secondary, and more than secondary education was 33.3%, 6.7%, and

basis, while 10% clean them every 2 or 3 days. According to Islam *et al.* (2018), roughly 79 % of goat farmers in Sylhet clean their goat houses on a regular basis, whereas 21% clean them irregularly.

Sheep and goats are raised in three different ways all across the world. Extensive systems, semi-intensive systems, and intense systems are the three types. Surprisingly, in the research region, all of the goats are raised under a semi-intensive system. Our findings were in line with those of Islam *et al.* (2018). In Bangladesh, according to Islam *et al.* (2009), the majority of smallholder farmers (80.5%) raised goats in semi-intensive systems, although just a few farmers (7.3%) adopted confinement systems, while 12.2% used free range systems.

0%, respectively (Table 2). The findings are consistent with those of Islam *et al.* (2018) and Tanwar *et al.* (2010), who found that the majority of goat farmers were illiterate. However, Deshpande *et al.* (2010) discovered that the majority of goat farmers only possessed an elementary education. According to Rahman *et al.* (2017), 85.71% of goat farmers only have an elementary education.

Family size and occupation

The term family refers to a group of people who live together and eat meals from the same kitchen under the supervision of the same family head. In Bangladesh, the national average is 4.6 members/families (BBS, 2011). In the research area, 60% of goat farmers had medium-sized families with 4-6 members (Table 2). However, Islam *et al.* (2018) found that a substantial percentage of goat farmers in Sylhet had big families, which contradicts our findings. According to the findings, goat keeping is mostly performed in the research area by poor women (90%), who raise goats to supplement their income and better their families' living conditions. We discovered that the majority of the farmers were housewives (52%) who reared goats in their spare time. Furthermore, as seen in Table 2, 28% of farmers are laborers, 13% are farmers, and only 7 % are business owners. As per Rahman *et al.* (2018), the majority of goat farmers in Sylhet were laborers (59.53%), followed by agriculture farmers (31.33%). While Hossain *et al.* (2017), Rahman *et al.* (2017), and Kumar *et al.* (2018) found that the majority of goat keepers work in

Table 2. Socio-economic characteristics of the respondents (n=60)

Parameter	Category	Respondents	Percentage (%)
Age	Young age (up to 35)	19	31.7
	Middle age (36-50)	29	48.3
	Old (>50)	12	20.0
Gender	Male	6	10.0
	Female	54	90.0
Education level of farm owner	Illiterate	36	60.0
	Primary (1-5)	20	33.3
	Secondary (6-10)	4	6.7
Family size	Upper than secondary	0	0.0
	Small (up to 3)	8	13.3
	Medium (4-6)	36	60.0
Occupation	Large (above 6)	16	26.7
	Agriculture	8	13.3
	Business	4	6.7
Farm size (hectare)	Service	0	0.0
	Labor	17	28.3
	Housewife	31	51.7
	Landless (upto-0.02 acre)	48	80.0
Source of Investment	Marginal (0.021-0.20 acre)	10	16.7
	Small (0.21-1.00 acre)	2	3.3
	Large (Above 3.00 acre)	0	0.0
Source of Investment	Own	32	53.3
	Ngo	26	43.3
	Bank	2	3.3

agriculture with goat raising as a side job, Deshpande *et al.* (2010) and Thombre *et al.* (2010) found that a large proportion of goat keepers are rural workers who do goat raising as a side job.

Farm size and source of investment

Table 2 shows that nearly two-thirds of goat farmers (80.0%) had no land, while 17% had up to 0.02 acres. Small farmers (3%) made up a very small percentage of the respondents. Surprisingly, no large farms were found in the research area. This revealed that a huge percentage of goat farmers were destitute and lacked inheritance rights to their land. The findings corroborated those of Islam *et al.* (2018), Rahman *et al.* (2017), Kumar *et al.* (2018), and Deshpande *et al.* (2010), who found that the goat keepers were mostly landless. Furthermore, Thombre *et al.* (2010) found that a higher proportion of goat farmers were small to marginal farmers.

An investment is a sum of money or property put up for the purpose of reaping future benefits. It is necessary to invest in order to grow your business and generate bigger profits. According to Table 2, more than half of the respondents (53%) used their funds to begin farming. Bank loans were used by only 3% of farmers. The main reason for this was that obtaining a bank loan was an extremely difficult process that required a large number of legal paperwork. Farmers preferred NGOs (43%) to banks to obtain loans to start goat farming, as seen in Table 2. The findings were consistent with those of Islam *et al.* (2018).

Goat feeding management

Among all other production expenditures, feed is the most expensive. As a result, one of the most crucial aspects of goat husbandry is feed management. In the study region, various types of feed ingredients were used for goat rearing. Green grass, wheat bran, and tree leaves were the most prevalent materials due to their availability. Various tree leaves are often utilized as a

supplement feed or scarcity feed for goats, according to numerous researches (Saadullah, 1989; Islam *et al.*, 1991; Alam and Akbar, 1989). Goats are excellent at utilizing tree leaves and shrubs, and if fed properly, they may be able to increase their yield potential (Amin and Alam, 1990). Table 3 shows the feed management of goats in the research area.

Source of feed and fodder

Table 3 shows that in the study region, two types of feeding practices predominated: grazing only (48.3%) and grazing with supplement (51.7%), which was the more common practice. In the research area, no farmer was found to be solely providing supplements.

The majority of farmers (86.7%) favored roadside grazing systems, whereas just 8.3% cultivated high-yielding fodder on their own. It's because there's enough of natural grass around their vegetable garden, and they don't want to produce fodder on their property. However, the availability of green grass and roadside grass reduces during the rainy season. Farmers had to acquire feed from other sources at the time, and goat feed costs were rising at the same time.

Farmers were found to be unaware of the best techniques for concentrate feeding management. The majority of farmers (52 %) thought that giving goats simply wheat bran as concentrate diet was sufficient. Some goat farmers (33%) gathered various feed items (wheat bran, broken rice, rice polish, oil cake, and so on) and blended a balanced diet on their farm premises. None of the farmers in the experimental area feed their goats commercial feed. About 15 % farmers did not supply any concentrate feed to their flocks and relied only on natural grazing. In the goat shed, all of the farmers had access to drinking water.

Prevalence and control of disease

In the research area, two primary diseases were discovered too often break down. It was skin disease and

the Peste des petits ruminants (PPR). Table 4 reveals that skin illness was the most common disease among goats in the experimental region (63%). Because of a lack of sufficient goat rearing expertise, the farmers in the experimental area have little or no knowledge of the

Table 3. Sources of feed for goat in experimental area

Parameter	Category	Respondents (n=60)	Percentage (%)
Sources of feed	Only grazing	29	48.3
	Only supplement	0	0.0
	Grazing and supplement	31	51.7
Fodder source	Roadside/natural	52	86.7
	Cultivation	5	8.3
	Purchase	3	5.0
Concentrate feed	Commercial feed	0	0.0
	Wheat bran	31	51.7
	Mixed	20	33.3
	Not at all	9	15.0
Provision of drinking water	Yes	60	100.0
	No	0	0.0

Skin disease was found to be prevalent in Black Bengal goats in the Mymensingh district, according to Nooruddin *et al.* (1987). Only 30% of the farmers had a complete understanding of the condition, while 50% had a limited understanding and 20% had no knowledge of goat disease, which is consistent with the findings of Islam *et al.* (2018). It was realized that goat farmers needed some basic training in goat disease prevention, control, and treatment.

Vaccination is the only way to keep disease away from the farm, and prevention is always better than cure. In Bangladesh, there is just one common vaccine for goats (Peste des Pestis Ruminant), which is produced by the Livestock Research Institute. The majority of the farmers in the trial area vaccinated their goats irregularly (58%). Barely 17% of farmers in the experimental area had aware of vaccination, and 25% of farmers had not vaccinated their goats. Our findings are in line with those of Islam *et al.* (2018), who found that 58% of farmers were sporadically vaccinated and 18.67% were regularly vaccinated their goat. According to Islam *et al.* (2016), just 8% of farmers vaccinated their goats. In contrast to our findings, Kumar *et al.* (2018) discovered that 91% of farmers regularly vaccinate their goats. Despite the fact that the Livestock Research Institute is

causes of skin disease. Another significant disease was PPR (37%), a highly contagious viral disease that can strike goats at any time (Balamurugan *et al.*, 2012). Our findings were in line with those of Hossain *et al.* (2017).

the exclusive source of vaccine to veterinary facilities, roughly 30% of farmers obtain vaccine from the local pharmacy. According to Islam *et al.* (2018), 56% of farmers bought vaccines from the local market. According to Hossain *et al.* (2017), 91.1% of farmers buy vaccines from local marketplaces. We found that, farmers primarily rely on the village doctor for veterinary services (53.3%) which is in line with the findings of Islam *et al.* (2018). Others sought advice from veterinary doctors (30%), while some provided drugs without consulting (16.7%).

Breeding system

Owing to the unavailability of artificial insemination services in this area, all of the farmers opted to natural breeding (Table 5). Most farmers castrate male offspring on the same day they are born in order to improve meat quality and make a profit. As a result, the farmers in the study area either hired (88.3%) or borrowed (12%) bucks for breeding, resulting in inbreeding. Our findings are in line with those of Kumar *et al.* (2018), who also stated that 100% of the farmers adopted natural breeding for goat production. According to Islam *et al.* (2018), the majority of farmers (96.67%) practice natural breeding and hire bucks for breeding.

Table 4. Incidence and control of goat disease in the study area (n=60)

Parameter	Category	Respondents	Percentage (%)
Major disease	Skin disease	38	63.3
	PPR	22	36.7
Idea about disease	Clear idea	18	30.0
	Partial idea	30	50.0
	Not at all	12	20.0
vaccination	Regular	10	16.7
	Irregular	35	58.3
	Not at all	15	25.0
Vaccine source	Livestock office	42	70.0
	Local market	18	30.0
Veterinary services	Veterinary doctor	18	30.0
	Village doctor	32	53.3
	No consultancy	10	16.7

Table 5. Breeding system practiced in the study area

Characteristics	Category	Frequency	Percent (%)
Breeding method	Natural	60	100.0
	Artificial	0	0.0
Source of breeding buck	Borrowed	7	11.7
	Own herd	0	0.0
	Hired	53	88.3
	Bought	0	0.0

Cost benefit analysis

Farmers in the study area were divided into four categories based on their land size: landless, marginal, small, and large. However, no large farms were found in the research area. As a result, a cost-benefit analysis for landless, marginal, and small farmers was conducted (Table 6). The cost components of goat production, such as investment, maintenance, production, and total cost, were computed and displayed in the table among sample farmers in the study area. In the study area, the cost of goats accounted for the largest amount of the total cost (approximately 59%), followed by feed cost (15%), and house cost (13%). The largest overall cost was incurred

by small farmers (BDT 62340), followed by marginal farmers (BDT 38490) and landless farmers (BDT 33780). The selling of castrated male goat (Khashi), which was sold on several occasions, was the main source of income for the farmers (45%). Small farmers received the highest gross returns per farm (BDT 33660), followed by marginal farmers (BDT 28510) and landless farmers (BDT 24220). However, marginal farms had the highest net profit per goat (BDT 3168), followed by landless (BDT 3028), and small goat flock owners had the lowest net profit per goat (BDT 2589). Pravu *et al.* (2011) found that the gross return per farm per year was higher in large farm groups than in landless farmers, which is in line with our findings.

Table 6. Cost benefit analysis of a small scale goat farm

Particulars	Landless	Marginal	Small	Average	Percentage
Average no. of adult goat	5	6	8	6.33	
Average no. of castrated male	2	2	5	3.00	
Average no. of doe	3	4	3	3.33	
Average no. of kids	3	3	5	3.67	
Investment cost (BDT/goat)					
Purchase cost	20000.00	24000.00	36000.00	26666.67	59.43
Housing cost	5000.00	5000.00	7000.00	5666.67	12.63
Tools and equipment cost	2000.00	1800.00	3000.00	2266.67	5.05
Total	27000.00	30800.00	46000.00	34600.00	
Maintenance cost					
Depreciation of building	500.00	450.00	550.00	500.00	1.11
Depreciation of equipment	300.00	320.00	310.00	310.00	0.69
Total	800.00	770.00	860.00	810.00	
Production cost					
Feed cost	5250.00	6000.00	9200.00	6816.67	15.19
Castration cost	200.00	200.00	500.00	300.00	0.67
Medicine cost	350.00	480.00	600.00	476.67	1.06
Breeding cost	180.00	240.00	180.00	200.00	0.45
Labor cost	0.00	0.00	5000.00	1666.67	3.71
Total	5980.00	6920.00	15480.00	9460.00	
Grand total cost (BDT.0)	33780.00	38490.00	62340.00	44870.00	100
Revenue					
Sale of castrated male	22000.00	22000.00	55000.00	33000.00	44.80
Sale of kids	9000.00	9000.00	14000.00	10666.67	14.48
Value of unsold doe	27000.00	36000.00	27000.00	30000.00	40.72
Total	58000.00	67000.00	96000.00	73666.67	
profit/farm	24220.00	28510.00	33660.00	28796.67	
profit/goat	3027.50	3167.78	2589.23	2928.17	

Problems with goat husbandry and their solutions

In Bangladesh, there are a number of obstacles to expanding the livestock production industry. In the livestock industry, risk and unpredictability are key concerns. Aside from that, goat keepers have been dealing with a slew of major issues. This chapter discusses the primary issues and constraints that farmers

encounter when it comes to goat keeping, as well as the solutions to these issues, so that farmers may get a greater return on their investment. Farmers were urged to report any serious problems they were having with goat farming. The key issues that farmers confront, as well as potential solutions, are summarized below:

- I. Lack of housing facilities: Small farmers maintain their goats with fewer facilities in the house due to a lack of accommodation. As a result, farmers will need proper support and training from an NGO in order to improve goat house facilities.
- II. Lack of credit and the difficulty of obtaining bank loans: To address the problem of a lack of cash, a short-term loan for goat rearing should be made available to goat farmers on reasonable terms and conditions by the bank/NGO.
- III. Inadequate health care, irregular immunization, and disease outbreaks: Veterinary services and health services, such as routine vaccination and goat treatment, must be ensured by local service providers.
- IV. Goat thievery
- V. Lack of grazing land: This problem can be solved by cultivating high-yielding fodder and tree leaves for goat browsing, as well as leasing government khas land for goat husbandry.
- VI. Problems with marketing and transportation: a particularly designed pick-up vehicle for comfortable transportation of goats from farm to market and butcher's shop, as well as local government improvements to market facilities in terms of space, sanitation, and feed, are critical.

Conclusion

The experiment was conducted in Khagdahar union of Sadar Mymensingh district, with the goals of defining goat farmers' socioeconomic conditions, evaluating their profitability, and highlighting the problems they confront. According to the findings of this study, the majority of farmers raised Black Bengal goats in a semi-intensive system. The farmers generally were middle-aged housewives who started farming with their own money and had little or no land to begin with. Even though goat-rearing isn't their major business, these farmers needed to take out loans to get started. Furthermore, their housing management was not well established due to a lack of technical understanding, and they continued to use the traditional feeding system, relying on natural fodder and wheat bran as a concentrate feed. There was also a paucity of information among the farmers concerning disease prevention and vaccination. They did not vaccinate their goats on a regular basis and relied on the village doctor for technical assistance. When it comes to breeding, farmers utilize buck without regard for inbreeding. In terms of profitability, the study clearly shows that farmers with more goats can earn a higher return. Profit per goat, on the other hand, can be unpredictable. Expanding goat rearing might help rural people overcome their poor income and protein shortfall. Therefore, it is critical to have regular training sessions and educate them on scientific nutrition, breeding, management, and disease control in goats.

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