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Transportation of Small Ruminants on Road: Some Practical Tips

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ABSTRACT

India has a mega diversity in terms of small ruminant (sheep and goat) wealth with many recognised and regionally-adapted breeds, contributing to food and nutritional security of the country. For many reasons, transportation of small ruminants from one place to another becomes important and therefore, it is essential to know the scientific practices associated with it to minimise losses. To this end, the present article provides some practical tips and tricks to animal producers for a successful transportation of small ruminants.

***Keywords*:** Animal welfare, Black Bengal, Goats, Livestock, Transportation

Livestock is an integral component of agrarian economy of India, contributing to about 30% of agricultural gross value added. Small ruminants comprising of sheep *(Ovis aries)* and goats *(Capra hircus)* are the key livestock species, providing livelihood security to rural masses. While goat is regarded as the poor man's cow, which has 3% share in the national milk basket, sheep is primarily reared for meat and wool. Together, small ruminants serve the second most preferred source of animal protein (meat) by Indians, next to poultry.

It is known that feeding, breeding and management are the essential pillars of successful animal husbandry. In order to run the farm on a sustainably profitable manner, it is important that animals are transported from one place to another for a variety of reasons such as selling, procuring replacement stock, relocation of farm as well as for research and development activities etc. As transporting animals without paying due attention on their comfort by overcrowding etc. may lead to loss of animals, causing financial loss to the farms. In this regard, the present article gives some practical tips and precautions that must be exercised during transportation of small ruminants, whilst also ensuring safety, comfort, minimising transportation stress and thus ensuring overall welfare of the animals. These are discussed pointwise under sections like before-, during- and after transportation as well as a brief note on our own experience in transporting Black Bengal goats for research purpose.

I. Preparation before transportation

(a) When to plan for transportation?

- Transportation should be planned on a normal day having no adverse weather conditions.
- It's preferred to transport animals during night time and early morning hours when the weather condition is cool and much conducive, which minimises any chances of dehydration in animals.

(b) Vehicle specifications

- Use a livestock transport vehicle (trailer or truck) that is especially custom-designed for animal transport, for instance, wooden ramp to ease loading etc.
- Surface disinfectants like phenol and lime must be used on the floor of the vehicle to ensure hygienic and sanitary transport environment.
- There must be no sharp objects and nails in the vehicle to avoid any injury to the animals.
- Bedding and side padding need to be arranged for the better comfort of the animals.
- Floor should never be made slippery for which materials like sand, paddy straw or old beds can be used.
- Roof (top) of the vehicle must be covered with the tarpaulin sheet, mainly during rainy season.

(c) Other management considerations

- In case of buying pure-bred new stock, one must pay attention to distinct breed characteristics like morphology and performance traits if available in the farm records.
- Note down the prevailing feeding and other management practices followed in the farm.
- Male and female animals are not to be mixed, and generally avoid transporting advanced pregnant animals.
- Animals should be counted prior to and after loading.
- Optimum feeding and watering to be done before loading the animals.
- Before transport, it is suggested to make a preliminary physical (any abnormal growth, lymph node swelling, etc.) and clinical examination (temperature, heart rate, respiration rate etc.)
- Anti-stress liquid containing calcium, chromium, multivitamins etc. and/or jaggery water (sugar) with lemon juice (vitamin C) provides much relief from heat stress during summer time.
- Keep a first-aid kit ready in the vehicle to address any minor injuries etc. during transit.

II. During transportation

- Animal attendant who is well-versed with the nature and behaviour of animals in transit should accompany the driver of the vehicle.

- Vehicle with adequate suspension must move slowly, preferably with a speed limit of 40 km/h.
- Head of the animal must ideally face towards the engine of the vehicle.
- Care to be taken not to injure young animals (kids and lambs).
- Adequacy of light and ventilation has to be monitored.
- Keep fresh tree foliages/branches or legume hay hanged in the vehicle (top and sides), and for a long distance transportation, it is recommended to give periodic stops for observing any misplaced animal, and if necessary, may unload the animals in between for giving some rest.

III. Unloading and care of animals after transportation

- Unloading should be done manually slowly while simultaneously also counting them and that should match the initial count at the time of loading.
- Animals are to be shifted to a clean and pre-disinfected shed, and immediately offer drinking water mixed with jaggery/molasses to keep the animals hydrated.
- Observe for any injury, nasal discharge etc. and if yes, treat them immediately.
- Physical and clinical examinations of individual animals need to be done to rule out any infection, pyrexia etc.
- Anti-stress liquid and liver tonic may be drenched at 5-10 mL/goat for 3-4 days.

(a) Observation of animals in the new farm

- Individual identification of animals, ageing through dentition as well as body weight (and if possible, body condition score) need to be noted down to maintain better on-farm records.
- Observe the response and activity of the animals to new diet in the farm.
- Feed intake and faecal consistency need monitoring to ensure proper digestion of feedstuffs offered in the new farm.
- Appropriate measures are to be taken if there are fighting/dominance behaviour etc. by some animals.
- Any change in rearing/managemental practices should not be done suddenly rather on a gradual basis.
- Scheduled healthcare practices (vaccination and deworming) are to be followed.

Fig. 1. Newly arrived Black Bengal goats consuming foliage of Indian gooseberry in a linear feeder

Transporting Black Bengal goats: our first-hand experience

Keeping the above points in view, we have recently (Aug. 2024) transported 18 Black Bengal goats (16 does and 02 bucks) from Choubeypur, Varanasi to Barkachha, Mirzapur with a distance of 100 km on road. All animals were loaded to the mini pickup truck (TATA Xenon Yodha) with the body of vehicle covered with tarpaulin sheet and closed the rear side of the vehicle with the rope in a zig-zag fashion, allowing thorough ventilation across the vehicle. Upon arrival, oral liquid calcium and liver tonic, each at 5-10 mL/goat was drenched for 5 and 10 days, respectively. All the animals were dewormed using pregnancy-safe dewormer (fenbendazole) as per the recommended dose. Animals remained healthy, and upon two months of observations, seven does have given birth to kids. All the kids are apparently healthy, suckling their mother's milk and are in active growing stage.

Fig. 2. Black Bengal doe nursing her twin kids

Fig. 3. Healthy Black Bengal kids at 15 days of age

CONCLUSION

Since transportation is an inevitable process associated with small ruminant husbandry, following some scientific practices as discussed in this paper would help to fulfil the purpose of transportation avoiding any loss (mortality) of animals and thereby minimising any untoward financial losses to the animal producer.

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REFERENCE:

DAHD (2024) Basic Animal Husbandry Statistics, Department of Animal Husbandry and Dairying, Government of India.