

Goat Behaviour

Goats are exploratory and reactive animals who will face an attacker if threatened. Like most ungulate species, goats show a high level of social organisation, this may be established through butting, rearing or clashing heads. A hierarchy allows for better protection from predators, effective foraging and better access to partners and offspring care. Under natural conditions a typical herd can range from 4 to 300 goats.

Olfactory (smell) signals are important to goats and you will notice that they urinate frequently. This is one of the main signals of individual identity, especially in relation to reproductive status.



Diet & Nutrition

Goats are ruminants meaning that they have four chambered stomachs: three fermentation chambers (rumen, reticulum and omasum) followed by the abomasum, which uses stomach acid for digestion.

Goats need constant and unlimited access to fresh, clean drinking water. They can drink 4-6 gallons a day.

A supply of long, fibrous food is needed in order for the goat's rumen to work efficiently. The most important bulk food to supply is hay (free from mould), which should form around 50% of the goat's diet. Additional forage such as long grass, branches and other non-poisonous plants should make up a further 25-50%. As goats primarily browse they prefer not to eat anything off the floor.

It is important to body condition score your goat, this is the process of evaluating the lumbar region, the sternum, and the rib cage to evaluate on a 5-point scale to monitor how fat or thin your goat is (shown right).

You may find that your geriatric goat needs extra supplementation through bulk food. In the winter Readigrass can be used as a grass supplementation and throughout the year pre-made goat or pygmy mixes may be given to provide additional vitamins and minerals, ideally mixed with a long fibrous feed such as alfa-a. Overfeeding of concentrates must be monitored as it can cause obesity and the formation of bladder stones.

Access to a mineral salt lick is also required.

CONDITION SCORES

1
Very Lean
Body angular, narrow and slab sided. Backbone raised and sharp. Ends of short ribs sharp and easily felt.

2
Lean
Backbone raised and barely covered. Pin and hip bones obvious and barely covered. Ends of short ribs smooth but easily felt.

3
Medium
Backbone slightly raised, smooth and rounded over top. Pin and hip bones lightly covered. Ends of short ribs smooth but can still be felt. Moderately rounded appearance.

4
Fat
Smooth, rounded appearance. Backbone can only just be felt. Pin and hip bones smooth and rounded. Ends of short ribs cannot be felt.

Plants

Goats greatly enjoy eating wild plants, some are safe, but others must be avoided. Below is a list of some of the most common plants, however, the general rule is if you don't know don't feed it.

DO NOT FEED: Alder, Yew, Rhododendron, Laurel, Privet, Laburnum, honeysuckle, walnut, evergreen shrubs, other green forage from flowers including delphiniums, hellebores or any bulbous plants such as daffodils or tulips.

AVOID: Hemlock, buttercup, bryony, dog's mercury, ragwort, mayweed, foxglove, celandine, any nightshade, and old man's beard.

Overfeeding of brassica plants like cabbage, cauliflower and Brussel sprouts may also have minor side effects.

GOOD: Willow, blackberry branches, silver birch, bamboo, mint, nettles, wild roses, dandelion, brambles.

Dentition

Goats lack upper incisors and instead have a hard dental pad on the frontal part of the upper jaw. Goats are efficient at keeping their teeth maintained properly. However, an older goat may start to show signs of weight loss or improper cud chewing, which may mean they need a vet to come and float the teeth and correct the issues.

Hoof Trimming

In the wild the hooves are worn down by continual climbing. In domestic conditions, however, the hooves often grow out of shape. Feet should be checked every 4 weeks to see if they need trimming.

When trimming goat feet, look at the white outer wall of the hoof - if it is starting to fold it needs to be removed. To do this simply place the shears flush to the foot and trim the excess (as seen below):



Common foot problems:

- Hoof overgrowth, insufficient trimming practice
- Wet and muddy conditions, creating foot rot
- Nutrition, causing flaky feet, a biotin supplement is recommended
- Sores/ Scald in between the toes

TPR

Temperature 38.5-39.7 °C
Pulse 70-80
Respiration 12-15

Vaccinations

Vaccination against clostridial disease is widely accepted as good practice and if used, a booster vaccination needs to be given every four to six months.

Parasitology

Goats can contract several internal parasites: nematodes, roundworms, tapeworms, liver fluke, lung worms and coccidia. Goats do not become immune to parasites so should be monitored with faecal egg counts to determine the type and number of parasites, the vet can then guide on the correct drug, dosage, and time interval for the next check.

Pasture management, poo picking, and rotational grazing can help remove egg build up on the pasture.

Lice and mites are also a common problem in goats, they can often be seen moving around, if goats are seen excessively itching or scratching veterinary advice must be sought.

If the goat has wounds, foot-rot, or soiled areas the animal must be kept clean and sprayed with fly-spray to deter flies from laying their eggs (flystrike). Breeds such as the angora will need crutching until it is warm enough to shear them.

Common Issues

- *Environmental hazards*: Goats are browsers and tend to nibble or inspect most things in the environment. Care must therefore be taken not to leave plastic bags, cloths or bailer twine and other small objects where goats may access them.
- *Scouring*: result from change in diet, parasites, ingestion of poisonous plants
- *Lameness*: foreign body in foot, compaction of mud in toes, physical injury, scald (bacteria in skin), foot-rot (bacteria where sole area of hoof degrades)
- *Mastitis*: infection to the udders, both males and females should be checked for infection, heat and painful deposits
- *Bloat*: Inability to expel the gases produced in the rumen, baking soda should be provided freely to help them self-medicate.
- *ORF*: A contagious viral infection where blisters form around the goat's nose and mouth.
- *CAE (Caprine Arthritis Encephalitis)*: This is an incurable disease that compromises a goat's immune system.
- *CL (Caseous Lymphadenitis)*: Chronic, contagious disease that causes pus filled abscesses to form around the goat's lymph nodes, when these burst, the pus can spread the infection to others

Geriatric Goats

If your goat seems unwell, under the weather or does not feel like eating, B12 injections can be given. The thiamine helps the formation of red blood cells, giving your goat a boost. Ideally, in an elderly goat, these will be given 6-weekly to provide them with the energy they need.

The elderly goat may also suffer from arthritis. There are approved supplements containing MSM, glucosamine and chondroitin for horses that have been proven safe to use for goats.

Shelter

Goats have no waxy lanolin in their hair, which means that they cannot tolerate wet conditions and will try and seek out shelter in bad weather. Goats must always have access to a shelter whatever the season. This should be bedded comfortably with straw and large enough for them to shelter together.

Fencing

- Fencing must be at least 4ft high, if you have a more active breed like a Nubian this must be 5ft.
- No gaps on the bottom as goats can crawl under.
- Goats will put their heads through fencing so make sure gaps are no larger than 4x4 inches- so the horns do not get stuck.
- Wire panels must be attached to the inside not outside as they can be pushed off.
- Hinges for doors or gates must open towards the goats, they are escape artists.
- Vertical posts must be strong and made of wood or metal with bases or well concreted into the ground.

Enrichment

Having evolved in rocky, mountainous terrain, goats are extremely agile and good at climbing. Consequently, research shows it is good to enhance their pens with platforms and toys to stimulate natural behaviour. It may also be beneficial to add a rough surface on top of wooden toys to help with feet trimming.

Another way to replicate natural behaviour is to provide a goat with dusty sandy areas to dig and bathe in and scratching posts to itch on.

Legal Duty of Goat Owners

In England and Wales, the Animal Welfare Act 2006 introduced a legal requirement to set a standard of care for animals. This means owners are responsible to make sure goats needs in their care are met in accordance with good practice.

Owners must also be aware of government regulations governing goat identification, movements and holding registration; an owner must obtain a holding number for their land from the Rural Payments Agency (RPA), register the goats with the Animal and Plant Health Agency (APHA), and keep a copy of the flock/herd register to identify any movements of the animals. This is important to track any disease outbreaks. This is a simple process and details on how to do it can be found here: [Sheep and goat keepers: register your holding and flock or herd - GOV.UK \(www.gov.uk\)](http://www.gov.uk/government/guidance/sheep-and-goat-keepers-register-your-holding-and-flock-or-herd)