

How To Trim Sheep and Goat Hooves

Kelly Froehlich, Assistant Professor & SDSU Extension Sheep and Goat Specialist Jaelyn Whaley, SDSU Extension Sheep Field Specialist Tumen Wuliji, Professor - Research/Animal Science, Lincoln University, Missouri March 2023

Introduction

Lameness is detrimental to the health and welfare of small ruminants and decreases productivity. Studies conducted by USDA NAHMS rank lameness as the second most concerning disease, disorder, or pathogen priority in sheep and 5th most concerning priority in goats (USDA NAHMS, 2019, 2021). Moreover, lameness/footrot is the 3rd most frequent reason for antibiotic use on U.S. sheep operations (USDA, NAHMS, 2011). Controlling and preventing lameness while correctly diagnosing when it occurs can improve the health and welfare of small ruminants.

Regular trimming and examining of hooves should be part of a small ruminant health management plan. At a minimum, hooves should be trimmed 1-2 times a year depending on growth, nutrition, and environment. Consideration should be given to reflect the time or season of the year. Hooves tend to be softer and easier to trim during wetter parts of the year e.g., spring. Furthermore, lameness and spread of hoof related illnesses often occur during these wetter periods and hoof trimming allows for early examination and detection of any impending issues.

Restraint & handling

Sheep and goats should be properly restrained during hoof trimming and examination to reduce injury and stress to both animal and human. There are several methods of restraint (Figure 1). For sheep this includes sitting an on its rump, in a sheep chair, using a stand or tilt or turn table (not pictured). To sit a sheep, firmly grip the sheep under the jaw with one hand and push their nose away from your body towards their hip. Simultaneously with the other hand, push their hip in the same direction and towards the ground, (if you're pushing their chin to your left, push their hip to your left). Once the sheep is laid on the ground, they can be rocked up onto their rump by holding onto their front legs. When sitting a sheep on its rump, place the animal slightly off-center so most of its body weight is on its hip rather than the dock. When done properly, the sheep should not struggle and be easier to handle. Goats will not sit as nicely in a chair or on the rump so a stand or turn table should be used. When using a stand, a person can let the animal rest against their legs while grabbing one leg at a time to trim or examine the hoof.

Trimming tools & technique

There are a variety of tools available for trimming hooves costing from ten dollars to hundreds. These tools can be found at any livestock supplier, or a small straight blade garden shear can be used from your local hardware store. When looking for a hoof trimmer it is important to purchase one that is durable, sharp, and is comfortable for you to handle. Pneumatic hoof trimmers use air and can reduce stress on hands, arms and shoulders but will be more expensive and may be uneconomical for smaller flocks. Handheld trimmers are economical for any size herd but like any kitchen knife, hoof trimmers can get dull! A sharp trimmer will always beat a dull one to help reduce hand/arm strain and the amount of time it takes to trim your animals' hooves.







Figure 1. Methods of Sheep Restraint

Consider purchasing a trimmer that can be taken apart allowing easy access for blade sharpening when necessary.



Figure 2. Different types of hoof trimmers.

Sheep and goats are cloven hoof animals with two hoof claws. After an animal is properly restrained an examination should occur of the hoof and the skin between the walls to inspect foot shape, any swelling, discharge (e.g., pus), or odor. An ideal, trimmed hoof should support the weight on the outer edge of the hoof wall and bulb of the heel, with little support on the soles of their hoof. Ideally, the bone in the hoof should be at a 55° angle to the ground for the front and 50° for the back (Figure 3, Lloyd & Playford, 2013). The hoof should rest flat on the ground with the outside claws curved slightly in (Figure 4- an ideal foot growth). When hooves become too long it affects the weight bearing and balance of the hoof and the foot can become splayed (Figure 4- overgrown foot). The change in the hoof shape in addition to being a harbor for mud, manure, and bacteria can cause a variety of foot issues and lameness.



Figure 3. Ideal front hoof angle

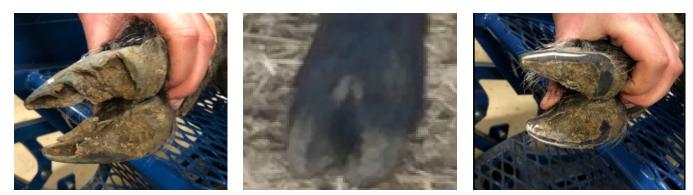


Figure 4. Front and bottom view of an overgrown hoof (left), and trimmed hoof (right)

When trimming, care should be taken not to over trim. Over trimming can result in bleeding and toe granulomas which can also contribute to lameness. As a hoof grows the outer wall grows continuously and folds under the foot while the tip of the hoof becomes pointy. It is important to clean out any debris and mud first. If the toe has become overgrown and pointy remove the sharp point and then move along the wall of the hoof removing excess growth. It may be necessary to also remove excess growth on the wall of the hoof in between the claws and along the heel. The walls, and heels should be trimmed almost flat with the sole of the hoof.

Trim the toe: The toe of the hoof can become sharp and pointy when overgrown. Carefully, the toe can be trimmed by removing a little bit at a time. The goal is to trim it back without causing bleeding.

Trim the wall and heel: As the hoof grows the wall folds under the foot. This excess growth should be removed from the wall and heel while not trimming past the sole.







Trim inside wall between claws: Sometimes it is necessary to trim excess wall growth between the claws.

Figure 5. Trimming hooves

Regular hoof trimming, 1-2 times a year, should be a part of any small ruminant operation. Although care is needed to not over trim hooves, regular trimming can help detect and mitigate hoof issues and help prevent lameness. While hoof trimming can be a chore, it is important to use a sharp hoof trimmer and find a method of restraint that works best for you and your farm to complete the task safely and efficiently.

References

Lloyd, J., & Playford, M. (2013). A producer's guide to sheep husbandry practices.



South Dakota State University Extension

SOUTH DAKOTA STATE UNIVERSITY® ANIMAL SCIENCE DEPARTMENT

SDSU Extension is an equal opportunity provider and employer in accordance with the nondiscrimination policies of South Dakota State University, the South Dakota Board of Regents and the United States Department of Agriculture.

Learn more at extension.sdstate.edu.