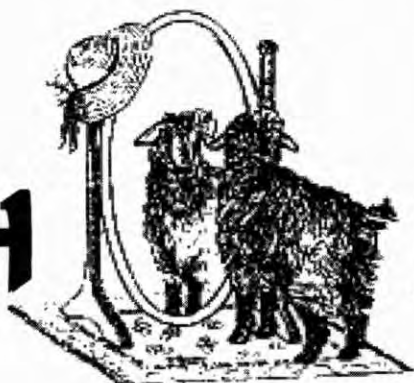


CASH MIRROR



Volume 10, Issue 7

April 1999

The monthly magazine devoted to cashmere goats and their fiber



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No responsibility will be taken for material while in transit or in this office, although we will certainly be real careful.

Cover photo:

Paul Johnson

"New kids check out Oregon spring mud."

Dallas, Oregon

Cashmere 2000 Conference Cancelled

Per Helen Simmonds, Convenor of Cashmere 2000, Australian Cashmere Growers Association, the Conference with was to have been held October 3 - 5, 2000, has been cancelled. The Directors of the ACGA, at their meeting on February 18, 1999, noted that the cashmere industry, world wide, is recovering very slowly from a recession caused by the Asian financial crisis. The Directors voted to postpone the international cashmere conference which was to have been known as "Cashmere 2000" until more favorable conditions exist.

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Melanie Schatz



Forte' Rumor Unfounded

We'd heard a rumor that Forte' had been sold and that the operation was being moved to the United Kingdom.

Ace Reporter, Paul Johnson put on his Sherlock Holmes hat and hunted for his pipe and magnifying glass to check things out. He found the magnifying glass, but discovered that his wife had tossed the pipe. He popped a piece of Nicorette gum in place of the pipe, pulled up a chair to his computer and emailed Dick Forte.

Mr. Forte's response was:

"No basis to the rumor. The garment division was sold to Dawson 2 years ago. It is still run by Dick Forte out of South Natick MA. The Forte Cashmere is still in Woonsocket and is run by Jim Coleman." (February 20, 1999)

Shall we give the Ace Reporter a raise?
Naaaa.....

Cashmere Goat Show

May 1, 1999
Skagit County Fair Grounds
Mt. Vernon, Washington

Sponsored by the North West All Breed Goat Club

Check in time for goats is 9:00 am. \$3 entry fee per goat. The goat and its full fleece (if it is old enough to have one) must be entered. Fleece judge is Linda Pardon; goat conformation judge is Kathy Wolner. Plenty of stalls available. There will also be a raffle and a silent auction for goats.

For more information contact:

Kathy Wolner 360-856-6384, email: klamanch@gte.net
Valeri Larm 360-428-5842, email: larm@gte.net

Reflections

by Linda Fox

The Intercom

Barn monitors are devices used by those expensive-horse people and other people who worry excessively. They're not for us sensible, well-grounded goat folk. We can trust our livestock home alone for the night. And we don't go around throwing money at unnecessary livestock toys.

Or so we thought. We visited the Maier's a few months ago. They're sensible, grounded people and they had a barn monitor. It was a baby monitor, actually—all light pink and baby blue. It looked cute sitting next to Doug's easy chair. They said it had saved them some problems already this year.

Our barn is 100 yards or so from the house—not a distance you want to travel any more than necessary. It's also uphill coming back. Maybe a barn monitor would save us a trip or two. We perused the local Radio Shack store. They had a couple of \$70-\$100 systems which would have done the job, but we didn't feel we wanted to invest that much money to save a few trips. They also had a simple two-unit intercom system that you plug into an electrical outlet for around \$25 (on sale). The clerk told us it would probably not work over the distance we had in mind as it had been designed to communicate from one room to another, or from your house to your garage, but if we wanted to take it home to try, we could certainly bring it back for a refund if it didn't work.

We took her up on the offer and brought it home. We plugged one unit into the living room and set it on the window-sill as close to the barn as we could get it. We hung the other unit in the center of the barn. It worked great.

We now had goats in our living room. Mostly they were quiet—until the kids started to arrive.

One night about 9:30, just as we were drifting off to sleep, we heard a small, tentative cry. A new one! We both rushed down to the barn to watch the doe deliver a second baby. Not that she needed us for anything and not that she wouldn't have been fine if we'd just found the kids the next morning like usual, but this was fun. We iodined navels, gave Bo-Se shots, juggled the new family and went back to bed. This new monitor was a good deal. Several new babies were discovered just as they were born after hearing new baby sounds on the living room unit.

As the number of kids in the barn multiplied, trips to the barn required by the monitor became more frequent. We went to check out a crying kid or an upset mom. Usually crying kids were just lost or had squeezed through to someplace unintended in the barn and couldn't find their way back to their mothers. Once I found a kid who had fallen in a water bucket while trying to scale the barn wall. It wasn't so deep that he didn't get out by himself, but the barn monitor allowed me to rush down and dry him off with a towel. Not that he wouldn't have been dry by the next morning and it certainly wasn't that cold out. But, I didn't mind the trip and felt good that I had been able to soothe him a little (and to move the bucket to a new

position so that it didn't happen again).

As the kid crowd in the barn exploded even more, we found we were making several trips per night to the barn to check things out. We no longer rushed out there together, but started taking turns. "Isn't it your turn to check things out?" "No, I'm sure it's your turn!"

Later, unless the situation sounded frantic, we started giving the situation ten minutes to resolve itself and usually it did. If we thought it was a new baby, we'd always head down—not because we needed to—just for fun. I guess I should add here that only two of our does kidded past 7 PM this year.

Our final kids for the year were born yesterday. The intercom didn't catch their arrival as the doe elected to have them outside in the sunshine. I found them a few hours after they were born; they were dry and dancing around in the grass.

Today I started putting away the kidding supplies. I boiled the remaining syringes and needles and bagged them to return to the kidding box. I laundered the old towels kept out in the barn and I brought up the "sacred barn list" of who was born when and who belongs to who. I'm debating whether I should turn off the intercom.

It doesn't really need to be on any longer. There isn't much sound coming through on it now except for the occasional sounds of last few younger kids. Most of the kids and their mothers are back with the herd already. The last four mothers will be sent back later this week. Do I leave the intercom on for the year, or retire it for the season with the other kidding supplies?

If I leave it on, the non-goat people will be sure we have no life beyond our goats. They can understand why we might want to monitor the barn during kidding season, but they will certainly see continued monitoring as a sign that we've lost it entirely.

If I turn it off, I will miss the frogs in the barn. The frog's start up after the sun goes down. I seldom hear the frogs when I'm in the barn, but they provide a nightly concert on the intercom. I also won't know when Twinkle is banging her head on the gate or when Samantha and the dog are tussling over the dog's food or when Topaz is beating up on the smaller goats. Leave it on... turn it off...leave it on...turn it off.

I guess I'll wait until next week to decide. As long as there's still kids in the barn, it's OK, right?

Cashmere Goats in Mongolia

Story and photographs by Grethe Kock

About the author: Grethe Kock worked in Mongolia three years as a missionary on a dairy goat project in co-operation with a team at the Agricultural University in Ulaan Baatar, the capital of Mongolia. During the three years she obtained a knowledge about goats in Mongolia in general and worked with and visited many goatherders.

Mongolia—the land of the blue sky and the land of livestock—is a good description of Mongolia! In Mongolia the sun is shining more than 300 days a year, and there are flocks of animals scattered on the steps: fat-tailed sheep, goats, cows, horses, yak-oxes and camels. If you are interested in livestock, Mongolia is the place to be! In Mongolia around 30% of the world's cashmere is produced, so for people especially interested in cashmere goats, Mongolia must be a country of interest!

Mongolia (or Outer Mongolia not to be confused with Inner Mongolia which is a province in China) is a big country situated between China and Russia. It is 604,250 sq. miles and 1,500 miles from east to west and 790 miles from north to south. It is only inhabited by 2.4 million Mongolians but they have the company of 35 million livestock. In the southern and eastern part of the country is the Gobi desert with very sparse vegetation. In the northern and western part of the country are mountains, lakes and forests, although there are very few trees in Mongolia. In the middle of the country are the endless steppes that are inhabited by millions of livestock. The number of goats is around 11 million—most of them are cashmere-goats. There are only few dairy goats.

In 1924 the communist People's Republic of Mongolia was declared with big help from the communist Soviet Union. The Soviet Union played a major role in Mongolia until 1990, when the Soviet Union broke down. They helped to develop the infrastructure, the education system, the health system, the industry, the agriculture, etc. Although they did a lot of good things for the country they kept the people in an iron glove. When the Soviet Union left Mongolia the country was left to survive without "the big brother" and had to deal with



Grethe Kock and a Mongolian cashmere goat

many problems themselves. The transition from a controlled economy to a free market economy has been and still is a very big challenge. The transition creates many problems with high unemployment, broken families, street children, increased numbers of poor people, increased illiteracy and a health system of very poor quality. Although the country is no longer communistic the communistic ideology still plays a

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Young boys comb cashmere from the goats.

Cashmere Goats in Mongolia

Continued from previous page

major role in peoples' lives. It is difficult for the population to adjust to a western/modern way of living.

The most common way of living for the people who have livestock is as nomads. They move around on the endless steppes in an effort to find new and better pastures for their animals. There is no private ownership of the pastures but it is something that the parliament is discussing now and then. If private ownership of the pastures is approved it will completely change the traditional way of living in Mongolia.

The nomads live in gers—which is a tent with a wooden frame covered with layers of felt. Skilled people can break down and rebuild a ger in a couple of hours. Nomads live on the steppes as their ancestors have done for hundreds of years, without modern comfort and without much contact with the world around them. Often family members or friends have their gers close by so they can enjoy each other's company and help each other with the livestock. During the long winter the nomads most commonly live at the same place every year. Most of them have made a kind of open barn to protect the livestock from the very cold winds. They use dried sheep/goat manure as insulation on the ground and cow manure to insulate the walls. The nomads live in harmony with the nature and their animals and survive mostly on the products that their animals can give them. In the summer mainly on milk products and during the winter on meat and dried milk products. It is a very simple, carefree but isolated way of living.

Until 1990-91, laws dictated how many animals each family could have according to the size of the family. A family with 4 children could for example have 5 horses, 5 cows and 50 sheep and goats. After that time the number of animals a family could own was unrestricted. That resulted in an explosive increase in the number of animals in Mongolia, because a big number of animals is the same as being rich and it is also regarded as a good life insurance. Before 1990 many people were employed at the big collective farms that were very common at that time. The big number of animals has started to become a problem for the nature. The steppes can't feed so many animals and the pressure on the pastures is too big. That creates problems with parasites and desertification. Earlier there didn't exist problems with parasites because the livestock didn't graze on the same pastures very often.

It is tough to be an animal in Mongolia. The climate is very dry and cold. Temperatures down to 40 F below zero is not uncommon and the precipitation is very limited. The winter lasts about 6 months and the steppes don't turn real green before June or later depending on when the summer rain starts. In the middle of September the frost starts and the steppes turn brown. It is not very common to make hay for the winter. It would be necessary to irrigate and fertilize to get a reasonably outcome. Therefore the animals are left with only the dry straw that is left from the summer grass—feed of very little nutritional value. It is not uncommon for the animals to lose 40% of their bodyweight during the winter. Even when the animals freshen hay is not available.

Continued on next page



Flock of goats in the Gobi Desert area—summertime.



Flock of cashmere goats—the steppes in the wintertime.

Cashmere Goats in Mongolia

Continued from previous page

Scattered around on the steppes are wells where the herdsman have to manually draw water up to the livestock (with a bucket)—and it is very hard work if he has a big herd of animals. Often you can see big herds of thirsty animals gathered around the wells waiting for the herdsman to draw water up. The people get the water for the household in the same way. In the wintertime the wells freeze and the livestock only have snow as their source of water and the same is the case for the people. It is bad if there is too much snow because it is very hard for the animals to find something to eat but it is also bad if there is very little snow because the animals can't get the water they need. When the sheep and goats freshen in March the wells are still frozen so the animals only have very little water to produce milk from and their milk yield is very limited so many kids died from lack of food and energy.

The Mongolian cashmere goat is a small animal. In October when the goats are as fat as they ever will get their average weight is about 85 pound for does and 120 pound for bucks. The kid's birthweight averages 5.5 pounds. The most common color of cashmere goats in Mongolia is brown and then white and grey. The cashmere from the brown goats is regarded as the best cashmere. It is easy to color and the fiber diameter is thin but it is not very long. The cashmere fiber from the white goat is longer but thicker than the cashmere from the brown goat, so the quality is not as good as the brown cashmere. The white cash-



Cashmere buck

mere is also more difficult to color.

The average annual yield from a goat is about 10 ounces, and from a buck it is about 12 ounces. The goats are combed in April/May. The herdsman ties the legs of the goat and puts it on a blanket on the ground. They use a comb that has the shape of a hook. It takes 20-30 minutes to comb a goat. In the spring the goats are very thin and the herdsman are in general tough to the animals so it can be very painful for the goats to be combed since they don't have any fat to protect the bones.

In Mongolia the goats and sheep are kept together in big flocks. When you drive over the endless steppes you can see big herds of animals and most commonly a herdsman on horseback to look after them. This is a cold and unpleasant job during the cold and long Mongolian winter.

It is not common to have identification tags on the goats and the herdsman don't keep any records of the animals except from what they can remember by heart. Not seldom the herdsman have surprised me with their memory of a specific animal but of course it is difficult to keep an accurate record of the individual animal. Often you can see livestock with different colors of thread in the ears.

Below: Herdsmen comb their goats.



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Cashmere Goats in Mongolia

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The thread indicates who owns the individual animal in a big flock of animals. In general the herdsman are very skilled in the way they are handling their animals. Fencing doesn't exist in Mongolia—the goats can go anywhere that the herdsman allow them to go. Areas which are cultivated are fenced in to protect the crops from the livestock.

On one occasion we were out on the steppes to control the goats that were a part of the project I worked on. We wanted to control 15 goats with identification tags that were part of a flock of around 800 goats and sheep. Two men looked after the goats—one on horseback. These two men managed to catch all the 15 goats one by one without help from fencing or herding dogs. That was a very impressive view. Sometimes herdsman use an *urga*—a long stick with a loop in the end—to catch goats and sheep. The stick is around 12 feet long and it really takes practice to be able to use the *urga* from horseback, which is the most common way to use it.

Since fencing doesn't exist the breeding is done very randomly. The bucks are a part of the flock year round and when the goats start to cycle—in July—the herdsman puts a bib on the buck to prevent him from breeding. This method is not very safe so often kids are born out of season. Because of the lack of fencing it is very difficult to do any kind of planned breeding—the bucks breed randomly. It is most common to breed in October and then the goats freshen in March—but already from January the first kids arrive.

The goats freshen outside in the cold temperatures and when the weather is still cold the kids and lambs are kept inside the ger. A little area in the ger is fenced in and the young animals are kept in the same room where the people cook, eat, sleep, etc. Every morning the young animals are carried outside to nurse before the herd goes out on the steppes and the same when the livestock arrives home in the

evening. It is interesting to see how all the young animals call after their mothers and the mothers call after their young ones. It is impressive to see how quickly they are able to find each other. It is something of a show to watch the herdsman and his family's effort to catch all the kids again. Most commonly the goats only have a single kid and that is probably the best since the food and water are very sparse. They simply don't have milk for more than one kid.

One time I tried to stay overnight in a ger together with the young livestock. When the sun rose the goats started to call their offspring and then a loud "concert" started in the ger and it was impossible to sleep any longer.

Often the goat freshens during the night and it is a difficult start for a kid to be born into such a cold world and many kids die. It is not uncommon that the goats freshen when they are together with the herd on the pasture. If that is the case the goat leaves the herd and delivers the kid. During the kidding season the herdsman always carries a bag around his neck. After the kid is born he simply picks it up before the mother even gets a chance to lick it and the kid get an opportunity to get colostrum. He puts it in the bag and keeps it there until he returns home to the ger with the herd in the evening. Sometimes he has several lambs and kids in the bag. When he arrives home he simply empties his bag and tries to find the right mothers to the kids. Often the goats can't recognize the offspring because they smell of other kids and the mother and kid didn't have an opportunity to establish the connection before the kid was put in the pack. Then the herdsman tries different things to "help the goat to remember." One of his tricks is to sprinkle some sugar on the back of the kids. Since the goats are so hungry the mother starts to lick off the sugar and suddenly she remembers that she had a kid the same day and she most commonly accepts the kid.

Continued on next page



The only kind of fencing that is available for handling goats.



Flock of cashmere goats.

Cashmere Goats in Mongolia

Continued from previous page

Faced with the fact that the kids need colostrum before too long after the birth the herdsman just answered, that herdsman have done it in this way for hundreds of years and succeeded, so what is the problem?? Maybe more kids would survive if the herdsman took the kid's need for colostrum more seriously. When the weather gets warmer the kids are outside during the day and inside the ger during the night.

Mongolia is the world's second largest producer of cashmere—only in China they produce more. In 1998, 2,530 tonnes of cashmere were produced. Until 1995, a law prohibited the producers from selling raw cashmere outside of the country. All the cashmere had to be processed in the country. Now the producers can sell the cashmere to whoever they like.

A couple of years ago there was an article in the English weekly newspaper in Mongolia about a herdsman in the Gobi Dessert who sold his cashmere to a Chinese buying agent. In return he got a windmill, a battery, a satellite dish and a TV. He was then able to sit out in the middle of nothing and watch TV-channels that he probably was not able to understand! I am sure he became very popular among the herdsman in the area!

Sometimes the herdsman sell their cashmere to local buying agents and they transport the cashmere into Ulaan Baatar (the capital) where it is sold to a factory. Some herdsman arrange the transportation themselves and of course get a higher price for the cashmere when they deliver it directly to the factory. Transportation is a major problem in Mongolia since the roads are so bad and the trucks in general are in very bad condition. On average the producers are paid 7000 tugrik (~7 US\$) a pound for the cashmere. In Mongolia there are currently two factories (Gobi and Buyan) where they process the cashmere and at these two factories they also develop new products and make the products. They also sell yarn to knitting companies. After the cubber-export, the export of cashmere—both wool and products—earn the most money to the country.

The biggest challenge the cashmere producers in Mongolia are facing right now is that the quality of the cashmere is decreasing. In the beginning of the 1980's cashmere goats were imported from Russia because the herdsman were not satisfied with the Mongolian cashmere goat's yield. The cashmere goats in Russia have a higher production than Mongolian cashmere goats. The crossbreeding with Russian cashmere goats helped increase the yield but it also had a very bad consequence. The quality of the cashmere started to decrease. In the last few years the number of cashmere goats in Mongolia has increased very much. It is a relatively easy way to earn money and for Mongolian conditions, the profit is good so all the

cashmere producers want to increase their number of goats. They just keep all the offspring as breeding stock without considering to select for fiber diameter and the consequence is that the quality of the cashmere is decreasing.

Attention has been paid to the problem and effort has been made to solve the problem. Research teams and the Agricultural Research Institute are working with recommendations to the herders, but it is a problem that takes time to solve. If the development towards an increased fiber diameter is not turned soon Mongolia will lose its position on the world cashmere market.

In general Mongolians eat very little goat meat and it can be hard to find goat meat for sale—strange in a country with 11 million goats. Only castrated males and defective nanny goats are slaughtered for eating. In general Mongolians don't slaughter young livestock. This is considered a waste because the animal will grow older and bigger. They just forget that the animals lose so much weight during the winter and many animals die so it would probably be smarter to eat some of the young animals before the winter really starts.

For people interested in the nature and livestock, Mongolia is a wonderful place to be/visit. The nature is so beautiful and it is very fascinating and interesting to experience how the nomads live—the same way as they have done for centuries. When you come so far out into the countryside that some of the Mongolians never have seen a foreigner before and are just staring at you, it feels like the world is not moving—if it was not for the car that is our means of transportation and not a horse that has been the Mongolians only way of transportation for centuries, you could easily forget that we are in the year 1999 and not in the year 1850. In general the Mongolians are very friendly people and they welcome visitors very warmly. So if you should get the idea of visiting Mongolia and experience the country, don't hesitate it will be a wonderful and big experience.



Cashmere kid



URL's For Those Without a Life (Except for Goats and Computers)

By Paul "I do so have a life!" Johnson

<http://www.standard.net.au/online/Info/terry.html>

Terry Sim's homepage at the *Warrambool Standard* where he is the Rural Editor—for those whom really miss him, here he is, with picture!

<http://www.abc.net.au/rural/>

ABC Rural Bush Telegraph

Provides comprehensive coverage of national (Australia) and international farming, current affairs, weather

<http://www.farminfo.org/goats/goats.htm>

Raising Goats

Many facts and links that are general goat related

<http://www.starwars.com/index.html>

Star Wars clips from upcoming movie!!

May the force be with you.

<http://www.teleport.com/~goatknol/nwca.htm>

North West Cashmere Association homepage

Contains basic information about cashmere and cashmere goats and an email link to contact the organization.

<http://dad.fao.org/dad-is/Home.htm>

Domestic Animal Diversity Information System

DAD-IS is the information system for the Global Strategy for the Management of Farm Animal Genetic Resources (AnGR) United Nations FAO

(Set the cool goat pictographs as "wallpaper")

http://www.agnic.nal.usda.gov/agdb/erdcalf.html#g_txt

Agriculture-Related Information Systems, Databases, and Datasets from USDA. A wealth of info, let Paul know if you find something helpful. Check out 20,000 recipes!

<http://users.med.auth.gr/~karanik/english/articles/integr2.html>

Integration of ancient and modern medicine towards a sustainable system of animal production and medical care. And that's just the first title!

<http://www.ars-grin.gov/cgi-bin/npgs/animal/breedlist.pl?Goat>

Goat

Goat Breeds (includes cashmere)

<http://www.dfmg.com.tw/dasp/mirr/dic/specfab.htm#cashmere>

Textile Dictionary—Specialty fibres

Interesting textile definitions of stuff like cashmere

http://www.indulgence-fashion.com/cashmere_e.html

Indulgence Fashion

Hangzhou Wanfeng Garments Co., LTD

Great pictures of Chinese cashmere goats!

Really worth a visit.

[Http://www.ars-grin.gov/](http://www.ars-grin.gov/)

National Animal Germplasm site

What's a germplasm?

<http://www.skaska.com/skaska/pages/view/index.nhtml>

Skaska Designs, Ltd.

Galina Khmeleva and George Girard's pages containing information and history about Orenburg knitted lace shawls. You can check out their upcoming workshop schedule here.

<http://www.riverspunfiberworks.com/>

River Spun Fiber Works, Lava Hot Springs, Idaho

A place to buy spinning fiber. Has a cool graphic of a spinning wheel actually spinning! Also has "fake cashmere" — touted as being "white, very soft and made of nylon." Cost is \$6 for 4 ounces, \$19 for a pound. As the reader who sent us the link commented, "Wonder if I could pay for it with fake money?"

Coming Attractions (Next Issue)

URL's from Linda (a net non-surfer) which answers the question, "Why does he spend so much time on that stupid computer!????"

Orenburg lace shawl information by someone who really *knows* something—someone who's actually been to a class!

Goat Breeds—Some different ones

Fake cashmere—What's it like?

The Importance of Being Coded

By Kris McGuire
CaPrA President

In my recent travels, it has come to my attention that not everyone has herd codes and more importantly, everyone does not know how to use them. So, let's begin at the beginning. Herd codes are three to four letter/digit combinations that are unique to each cashmere goat breeder. They are intended to identify all goats that are born on the farm affiliated with the code and they will play an increasing role in our lives. I have recently been traveling in Maine, Utah and Texas and have begun to gather data that may become part of CaPrA's developing database. It became immediately evident that we must all have herd codes in order to keep that data straight as there are only so many names and tag numbers out there and they are easily confused. Secondly, we must all agree on how to use the codes right away in order to avoid problems in the future.

CaPrA has been maintaining a herd code registry since 1991. There are approximately 170 codes now listed. It costs nothing to register a herd code—all you have to do is send in your request and one or two alternates to Marilyn Burbank in Rogue River, Oregon and she will add you to the list. Many of the codes are not now current, meaning that many of our original breeders in 1991 are out of business, but just in case, we will continue to maintain their codes. I am forever the optimist, I guess. So, if you don't already have a herd code, even if you only have 10 goats, write to Marilyn Burbank (PO Box 2067, Rogue River, OR 97537) and get registered. It's worth the 33-cent stamp!

Now the question becomes, how do we use this herd code? Now let's remember, CaPrA's policy states that your herd code identifies animals that are born on your farm. They are not intended to identify goats that were born elsewhere and that you have purchased. However, all the kids produced by those goats purchased elsewhere can be correctly identified with your herd code. Herd codes are very useful in competitions and in our database to make sure we know which goat comes from where. So please in the future, use your herd code when entering competitions and remember, just because you were smart enough to identify a good goat and buy it, it is not "your" goat. It must be forever identified with the herd code of the farm where it was born. You should not even change its name and you should never change its number. In the embryonic database, the herd codes are very important to track potential reference sire lines and will allow us to group goats in different age/classes with ease.

Now the sticky question arises. What happens if you sell a doe that was born and bred on your farm? By bred, I mean she is pregnant when you sell her and she kids at her new home. CaPrA had this discussion ad nauseam in the early 1990's and the end result was the simple admonition—if it's born on your place, it is yours, no matter who made the breeding selection

decisions.

There were and still are two sides to this argument. In my opinion, they cancel each other out, leaving us on the middle ground. Arguments against CaPrA's policy go like this: "I have this great buck and I sold the doe bred to this buck for extra money, therefore, the kids should be identified as my genetics."

There is an upside and a downside to this. The upside is that if the kid goes on to win some grand championship, his/her identifying number will carry your herd code and you will share in some of the glory. The downside is that if the kid is a dud, the new owner may try to sell it to some unsuspecting soul based on the fact that it came from your farm. Or the new owner may enter it in some competition and place last or worse yet, get sifted and that would reflect badly upon you.

The bottom line is, if you want to be identified as the breeder of a goat, wait five months and let it be born on your farm, whether or not the money has changed hands for the doe. That way you can control the culling decisions as well as the breeding decisions. And in this day and age when we still don't have a stable breed and great bucks and great does can produce twins, one of whom is great and the other a dud, we need to be cautious.

How to Register Your Herd Code with CaPrA:

Send your first choice, along with one or two alternatives to: Marilyn Burbank, PO Box 2067, Rogue River, OR 97537

Cost: Nothing

Optimizing Growth & Health of Newborn and Growing Kids

By Dr. Helen A. Swartz

Missouri State Sheep, Goat and Small Livestock Specialist
Reprinted from the *Goat Production Newsletter*, April 1997

Many kids are already on the ground and growing but in many herds, they are just beginning to arrive. Newborns need colostrum immediately following birth and an injection of Vitamin A, D, E and selenium in some areas. Milk replacer should contain 20-25% fat, 20-25% milk protein and 25-30% lactose. Milk replacers may contain high levels of antibiotics to avoid scouring and other digestive disorders. It requires 6-8 lbs of milk replacer per kid per week. Weaning kids early is more cost effective. Introduce kids to creep feed at 10 days of age. Begin with ground corn and soybean meal mixed to make an 18% crude protein ration. The SBM is tasty and kids like it. They also like cracked corn, bran, rolled oats, molasses and high quality leafy alfalfa hay. Have high quality leafy alfalfa hay available. The consumption of hay will increase rumen development at an earlier age. **Always have clean fresh water available and good ventilation.**

Balancing alfalfa hay with grain helps prevent urinary calculi (kidney stones) in the urinary tract particularly of males. The addition of ammonium chloride (1%) in the feed one week prior to weaning will help prevent urinary calculi. It is more commonly observed in some areas than others, probably due to the difference in mineral content of the water. The removal of milk calcium in the diet causes a shift to high phosphorus from the grain. The ratio of calcium to phosphorus in feed should be two part calcium to one part phosphorus.

Vaccinate for enterotoxemia (*Clostridium C&D*) and tetanus (*Clostridium tetani*) a soil bearing organism that is anaerobic and causes muscle spasms in mammals and is commonly found in manure and soil. The spores formed are highly resistant enduring in soil and manure for many months and possibly years. The toxin acts primarily through the central ner-

vous system. The organism enters tissues through injuries of the foot, navel cord, castration of males, needle perforations, dog bites and compound fractures, to name a few.

Self-feeding kids need at least 12 linear inches of feed bunk space. Kids hand fed a ground mix or pellet ration should clean up the feed in 20 minutes. Feed not consumed should be removed and fed to does. Provide salt free-choice and preferably iodized salt if you can find it on the market, otherwise provide the iodine in a mineral mix. Self-feeding rations generally contain between 60-85% concentrate with the remainder as roughage.

Pasture can be used for fattening kids if it is a high quality of grass or legume. Pasture plants must be nutritious and those most nutritious are a mixture of grass and legume. The annual cowpea (*Vigna unguiculata*) is an excellent pasture for fattening kids in Missouri, but they are slow to get started grazing compared to lambs.

Problems with high grain self-fed diets are acidosis (low pH in the rumen), diarrhea and enterotoxemia. Fortification of diets with Vitamin A, D & E are suggested at the following rates:

Vitamin A: 1,000,000-5,000,000 IU/ton
Vitamin D: 200,000-625,000 IU/ton
Vitamin E: 10,000-35,000 IU/ton

Vitamin E is insurance against white muscle disease. All B vitamins are produced by the micro flora in the rumen if rumination is functioning properly. Newborns must have B vitamins provided in the diet until the rumen develops

which may take up to 12 weeks depending upon what you are feeding and how early you are introducing them to feed.

Overeating disease (enterotoxemia) in nursing kids or those on feed affects the largest, fastest growing kids. Antitoxin gives an immediate immunity that is passive (much like the antibodies found in colostrum) lasting two to three weeks. Bacterin or toxoid will provide long-term immunity. This active immunity, requiring two injections and a booster at six months to one year, will usually protect the kids but not always. Do not inject bacterin in kids under three weeks of age.

Aureomycin (chlortetracycline) or terramycin (oxytetracycline) in creep rations for suckling and finishing kids will improve gain and feed efficiency. These antibiotics also offer some protection against enterotoxemia. Consult your veterinarian if you are considering the addition of these antibiotics to your feeding program. Aureomycin added at 20g/ton will aid in the prevention of enterotoxemia and 20 to 50g will help stimulate gain and improve feed efficiency. You may choose not to introduce your kids to drugs and prefer a more natural feed. The more we expect our kids to perform as a monogastric animal such as a pig, the more complications we encounter with enterotoxemia and other digestive disorders.

Lasalocid (Bovatec) added to the ration at 20 to 30 g/ton will help prevent coccidiosis.



"Feed us, Seymour!"



Dr. John Walker

Editor's note—The following editorial is by Dr. John Walker, Resident Director of Research at the Texas A&M University Research and Extension Center at San Angelo. His research experience spans 20 years and includes a wide array of topics in grazing management, livestock production, and plant-animal interactions. Walker was a range scientist with the Sheep Experiment Station at Dubois, Idaho prior to accepting his San Angelo assignment in 1997.

There is a range war brewing on West Texas ranches, but the key combatants aren't human. The controversy is between goats and white-tailed deer, and the feeding competition between them. Meat goats and deer seem to be the only consistent money-makers on West Texas ranches these days. Goats are also being actively touted as the only cost effective "biological control" available for noxious woody plants, especially juniper or cedar as we call it. Unfortunately, experts on both species increasingly "butt heads" concerning the potential damage goats can do to our native range and to white-tailed deer forage. In truth, the problems don't lie with the animals themselves, but with how they're handled.

Whether or not goats are God's or the devil's gift to range and wildlife depends

Range War in West Texas!

By Dr. John Walker

on their management. The rancher who decides their stocking rate, season of use, and other factors is the overriding factor determining whether goats are saints or sinners. Agreements and disagreements concerning goats' value as brush management tools depend more on management objectives than whether or not goats are good or bad for the range and white-tailed deer.

Rangeland management goals are as diverse as the people who own and manage property. Some want livestock, some want deer, and some want both. In any case, overgrazing is a management problem no matter what's causing it. An instance I am personally familiar with is the overgrazing by elk of Yellowstone National Park's northern range*. This travesty is the direct result of the park's no management policy termed "natural regulation." Natural regulation has resulted in a severe decline in willows and the elimination of beaver from the area. By comparison, managed grazing by domestic sheep on rangelands adjacent to Yellowstone's northern range proved that proper grazing actually sustains the natural resources. I realize Yellowstone is a long way from the Edwards Plateau. My point is—it's not the species, goat, deer or what have you, that's doing the damage; it's how they are managed. It doesn't matter whether you're pasturing mice or mammoths. If you graze too many for too long, there's going to be damage done to the range.

There's a little more to it though. As important as grazing pressure is as a brush control tool, it is limited by rain, fire and a plant's response to grazing pressure. Here on the Edwards Plateau, the herbaceous community (grasses and forbs) is determined by historic grazing pressure, while the woody plants are governed by a fire history. Of course there are interactions between herbaceous and woody vegetation components. Without enough grass for fuel, fire will not be successful in knocking brush back. Conversely,

too much brush stifles the herbaceous growth necessary to fuel a successful burn.

Animals graze the Edwards Plateau at the rate of 76 percent cattle, 6 percent sheep, 5 percent goats and 12 percent deer**. Because cattle are predominantly grass eaters who don't eat much brush, it's reasonable to assume by these figures that deer are the main culprits thinning palatable browse. A contributing factor was overgrazing of competing grasses and forbs by cattle and sheep at the turn of the century. Since mesquite and juniper are not the number one choice on any one's menu, they quickly spread across the once grass-covered range to establish the dominance they enjoy today. The years of continuous overgrazing reduced grass and forbs which once competed with noxious brush for moisture and nutrients. That and fire suppression developed the brush problems we now endure.

Deer and goats can be used to control juniper, admittedly at some cost of overgrazing desirable shrubs. Goats like browse less than deer, but they are more effective for juniper control because they are easier handled. The ability to control the goats' stocking rate, distribution and grazing season gives him the edge over deer in the brush control department.

Theoretically, using goats in numbers great enough for brush control will adversely affect deer habitat, but I could find no research data to support this hypothesis. On the contrary, I know one large operator*** who uses goats heavily and regularly on shin oak to stimulate new growth. Deer are subsequently attracted to the succulent new forage option.

The real question is what is the cost to

Continued on next page

Range Wars

Continued from previous page

the overall management objectives if goats are used as a juniper control tool? If a high deer population is the main goal, then the cost may be too much. You can't maximize goat and deer numbers simultaneously, because they eat the same things. If management objectives include multiple products, such as livestock and wildlife production which usually means a greater net return, then goats should be useful as a juniper control tool.

With that in mind, then the ideal juniper control goat would be the one that ate the most juniper. But to develop a real flock of "cedar eaters" one must change the nature of the animals to increase their preference for this undesirable plant. An ongoing effort in this direction is under way at the Texas A&M Experiment Station in Sonora where the heritability of preference for juniper by goats is being studied. Early results say that the heritability of cedar eating goats is 28 percent. That's not bad considering that the trait for multiple births in sheep is only 10 percent heritable. Add to the 28 percent the rapid biotechnology and molecular genetic advances now being made in animal science, we could conceivably have a super cedar eater someday. This advance would be like pitting a power saw against a hand saw. They both do the same work, but the power saw is faster. It can make a nail pounder look like a carpenter.

The current condition of the Edwards Plateau shows that most managers don't have the time, skill, or money needed to use the livestock currently available to create desired range vegetation. The goal of the Sonora project is to create an ecologically and economically sustainable goat that the average manager can be successful with.

In summary, all range wars aside, proper rangeland management is vegetation management and utilization. It is not one species versus another. Successful management will require that all the best tools be used to create the best vegetation. This "tool box" will probably contain

fire, herbicides, mechanical control, and yes, deer and probably goats. Goats have an important part to play in the range management game. They shouldn't be blamed for the mismanagement sins of their owners.

*Kay, Charles E. and Walker, John W. 1997, A Comparison of Sheep and Wildlife-Grazed Willow Communities in the Greater Yellowstone Ecosystem. Sheep and Goat Research Journal 13:6-14.

** Livestock numbers are based on 1997 Texas Agricultural Statistics categories for "All Cattle and Calves," "All Sheep and Lambs," and "Angora Goats." Only Angora goat numbers are kept on a county basis. Since meat goat estimates are 87 percent of Angora numbers, the Angora numbers were multiplied by 1.87 to capture a realistic number for all goats. Deer estimates came from the Texas Parks and Wildlife Department (Max Trawick, TPWD District Leader, Edwards Plateau Regulatory District, Kerrville, 830-896-2500). Deer densities were figured by multiplying 90 percent of the county size (except McCulloch County-80 percent) to correct for non-deer habitat, such as cities and cropland. Animal unit equivalencies were: cattle = one, sheep = five, goats and deer = seven. Data used came from the following typical Edwards Plateau counties: Burnet, Lampasas, Llano, Mason, McCulloch, Menard, and San Saba.

***Forest Armke, Ford Ranch, McCulloch



Spinning Spider Silk from Goats Milk

Spider silk is an amazing fiber. It is very strong for its size and researchers have their eye on producing it. A single strand of spider silk as large as a human hair would be strong enough to support a person. They're thinking it might be a nice fiber to use for bulletproof vests.

Only problem is, the spinning technique of the spider is mysterious and intricate and difficult to reproduce by other methods. Farming spiders is not considered feasible as they are small, non domesticated, territorial and generally nasty-tempered.

I did find an article in an old science encyclopedia featuring a woman who raised spiders. She periodically "silked" them—forcibly removing their silk strand by restraining them with a staple and drawing out their silk with tweezers. I don't think it caught on, although apparently at that time there was a demand for this thin, strong fiber for cross-hairs in rifle scopes.

Nexia Biotechnologies in Quebec, Canada plans to mass produce spider silk. Using the marvels of biotechnology, are they going to create a really big spider who produces miles and miles of silk and then will eventually go berserk and break out of the lab and overtake New York City?

No, they are using a goat's mammary epithelial cells to manufacture spider silk. So far, they have used the cells outside the goat and accomplished this in the lab. But, to mass produce the spider silk, they must do it inside the goat.

If they use a cashmere goat, they would have a fiber-producing goat—both on the inside and on the outside. The goats are not going to be happy about this.



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March 20, 1999: The star of the show—GK Bright Eyes. Born while an audience watched.



Another use for horns—peeking through! Photo by Marilyn Ackley, Bessey Place Cashmere, Buckfield, ME.



Little Bit: "Any chance I could get outta here?"



Kid



Above and below: Photos by Steve Hachenberger, Castle Craggs Ranch, Hamilton, MT. Have these people gone too far?



Shots



Bo Dyer feeds a kid. Photo by Jane McBride, The McRanch, Dripping Springs, TX.



Lola (Madonna's kid) sneaking up on an unsuspecting "kid pile."



Paul, the human jungle gym. He's fun to play with!



Young kid gets started right on Canadian Thistles. Good browse, eh? Photo by Gerry and Pat Fuhr, Giant Stride Farm, Onoway, Canada.

Book Report

By Linda Fox

Gossamer Webs

History and Techniques of Orenburg Lace Shawls

By Galina Khmeleva and Carol R. Noble

This book is great! It is a beautiful, well-written and awe-inspiring book, for someone who wants to create their own lace shawls, for someone who enjoys history and tradition and for any cashmere goat owner who wants to marvel at the possibilities.

The book focuses on the craft and tradition of creating the web-thin shawls of the Orenburg area, but includes a little goat information and a few photographs of the goats as well as a bundle of knitting patterns.

The city of Orenburg is located in Russia in the southern Ural mountain range. The book gives you a brief history of the area before moving on quickly to the history of these “wedding ring” shawls. There are numerous detailed photographs of completed shawls as well as good photos of sample shawls showing the traditional patterns used by the Orenburg artists.

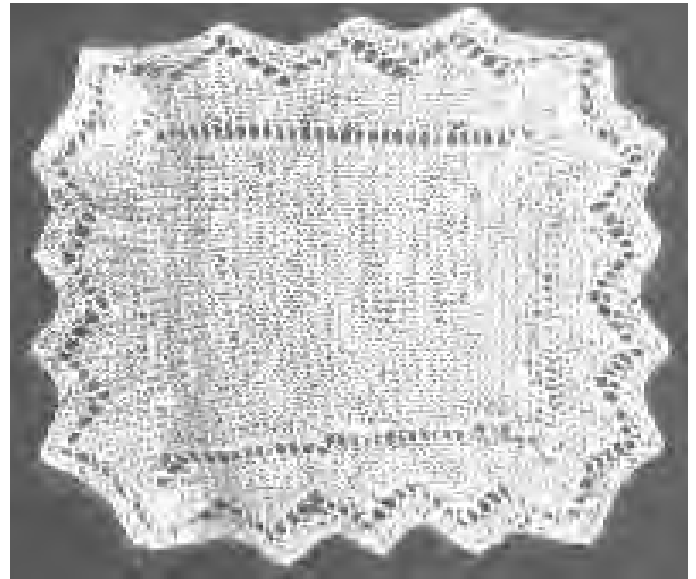
There is a fascinating section of the book featuring the local Orenburg knitters. They tell about their lives and their craft in their own words. They share how they learned their craft and early memories of life in their town.

Cashmere fiber is combed from local Orenburg cashmere goats. The guard hair is removed by hand from the cashmere fiber, combed using a special combing device, and then the down is spun into a very fine single using a drop spindle. This single is plied with a very fine thread of silk (which they purchase) and then knitted into gossamer shawls. And when I say very fine. I mean very, very, very fine! It takes only 2-1/2 ounces of down and 1/2 ounce of silk to make a 5' X 5' shawl.

While knitting the shawl, Russian knitters tie up the finished section in a babushka to keep it clean and out of the way. When the shawl is done, awaiting blocking, they stuff the thing into a large glass canning jar to avoid even more dirt and bugs. Finally, the completed shawl is washed and blocked to its final beautiful form using a special blocking frame.

I hear mind gears working here—only 2-1/2 ounces per shawl? And this is a big shawl! The smaller sized shawls require even less cashmere. Finally! A project we can make by harvesting only one goat. We'll think more about this later—on the next page.

About 2/3 of the book's 144 pages are devoted to preparing the fiber, spinning the yarn and knitting the shawl, including easily understood photographs (and detailed photos) of the tradi-



Sample Orenburg style shawl—miniature version with 4-hole tooth border and zero design elements. This sample isn't nearly fine or lacy enough to put anyone in the Orenburg Shawl Hall of Fame.

tional Orenburg design elements to the shawls. In practice, Orenburg shawl makers do not follow a pattern for a shawl design, but create their own designs using traditional borders and pattern elements. The borders are “five-hole tooth” borders. There are ten basic design elements for the interior of the shawl bearing names such as “peas”, “strawberries” and “fish eyes.”

A creative knitter combines borders and elements and sometimes different colors of fiber to produce a beautiful work of wearable art.

In case you think the whole concept is much too difficult for you to comprehend, let alone accomplish, the book shows Rita Gumerova carefully picking out guard hairs, combing fiber, spinning a fine yarn, plying and knitting—Rita looks to be about eight or nine years old.

Before we move on to my experience with knitting “gossamer” shawls, I leave you with one bit of advice: Buy this book! It's great. I purchased my copy from Threads and More, a yarn and needlework shop in Newberg, Oregon, but most yarn and spinning shops should have it. It was very recently published by Interweave Press. Retail price is \$21.95, \$30.95CN.

How to Make Your Own Gossamer Web (In Four Years or Less)

By Linda Fox

I finally have the new book *Gossamer Webs*, by Galina Khmeleva and Carol R. Noble. If you knit or spin, you've no doubt heard of Galina Khmeleva and George. She's the Russian lady (he's her husband) who have been traveling the country presenting workshops on Orenburg lace shawls. Actually, I cleverly borrowed a friend's copy of the book while awaiting my own copy on order.

The book contains instructions for creating your own Orenburg-style lace shawls using nothing except a little goat hair, a little silk, wool combs, a drop spindle and a pair of knitting needles. Sounded simple enough. I already had the goat and the knitting needles. I was intrigued by a possible cashmere product that could be produced from one annual harvest of only one goat. One 5' X 5' shawl takes only 2-1/2 ounces of cashmere! I could certainly get 3 ounces of cashmere combed from most of the goats. I had visions of "Ellena shawls" and "Fancy shawls" and "Ashley shawls." Sounds like a product that, with a little work, could be sold for a lot of money. I'd even be willing to pick out the danged guard hair on a couple of ounces!

The book stresses that you should create your own pattern for your lace shawl, not just copy someone else's pattern. They give you a few border patterns and ten basic design elements to put together to create your own personalized shawl. They suggest that you first knit a small sample shawl. This introduces you to the construction technique of the shawl and gives you a feel for the process.

Orenburg lace shawls are knitted with one strand of very fine cashmere plyed with one very fine strand of silk. I had a little very fine cashmere, plyed with itself so I decided to use it with the recommended size 0 knitting needles to knit my first sample. Per the instructions, this should produce a garter-stitch square of about 6" square with a border of four teeth per side.

The graph for the five-hole border is contained on one page of the book and the line by line instructions for the construction of the shawl begins on the following pages. They instruct you to "count holes, not stitches," but old habits die hard. I counted stitches and used a ruler to inch my way up the border graph while flipping back and forth to the following pages for the rest of the pattern. The shawl is constructed by first completing one side of the border, then turning a corner on either end, and then working up the entire piece—border on one side, the center section and then the border on the other side. Of course, you are on a different graph row for one side of the border than you are for the other so this was tough to track. Also, the graph needs to be read backwards for the one side of the border.

It took me a day to complete my first sample shawl. After blocking, it's lovely—but not quite large enough for a Barbie doll shawl. The center section turned out to be 3"

square instead of 6". After knitting a whole day with dark brown yarn on tiny little needles, my vision is somewhat blurry! The little piece weighs only three grams. This sounds pretty light, but a little math tells me that a 5' X 5' shawl using these methods will weigh 11 ounces. Less than a pound, but picking out guard hair from 11 ounces (assuming one had a goat with that much cashmere!) sounds prohibitive.

So, I planned my second sample shawl (shown about 1/3 of its actual size, on the previous page). I plucked out guard hair from little bits of cashmere retrieved from fences, the barn floor and from goats where the shearer had missed. I spun these (using a wheel, not a drop spindle) letting the colors come as they wished. I spun Bombyx silk, as fine as I could (while still retaining my sanity) and plyed the two together. I wanted the work to be bigger, as well as more lacy than the first, so I used size 3 needles—the book warned against going any larger than 3's.

This sample only took one evening to complete and I didn't use the border graph at all; I was able to get by just counting holes. This sample is probably big enough for Barbie—assuming she didn't have her mind set on the really big shawl—measuring 4" without the borders. It weighs 7 grams. My math tells me my full-sized model using this method would weigh 19 ounces. Silk must be heavy!

Friends, who have attended the Orenburg shawl classes, report that the knitting needles they use look like bicycle spokes (size 1 or 2) and that they knit verrrrrrrry loosely.

I decided that, since I don't knit verrrrrrrry loosely, I will throw all caution to the wind and knit my next sample on (gasp!) size 5 needles. Also, perhaps the lack of a lace design in the shawl center is making my mini-shawl heavy. So on the next sample, I will add a design element to the shawl's center. I chose "chain hearts" for my design element, mostly because it looked easy. I reluctantly spun more silk and plyed it with dark brown cashmere. I tried to make both singles finer than the previous yarns—without much success.

The third sample is looking promising. The larger needles are certainly easier on the eyes. The pattern is easier now—I can knit with a cat on my lap and even hold an occasional conversation. I haven't finished it so it is not yet blocked, but at this point I'd say that size 5's are too big and the yarn needs to be finer, especially the silk part of the ply. I didn't end this sample when I hit four teeth on the side, but am continuing on to play with different design elements. Perhaps it will end up a scarf.

My recommendations for knitting your samples:

Do count holes, not stitches.

Use bigger needles and fatter yarn for your first samples, unless you are a very good lace knitter.

Don't worry if it doesn't turn out exactly like the book; it's still pretty! Do you really need to stuff it through a wedding ring, anyway?

Monitoring Internal Parasite Infection in Small Ruminants

By Rich Machen, Frank Craddock, and Tom Craig

Frequently during the spring, summer, and early fall, based on subjective observation, internal parasites are cited as the cause for poor livestock performance. While parasites are frequently the culprit, other performance inhibitors do exist. Fecal egg counts are a practical, cost-effective diagnostic tool for determining parasite burden.

Materials and Equipment

1. Microscope—must have 100X magnification capability. Binocular preferred, monocular acceptable. Mechanical stage preferred but not required.
2. McMaster's slide—two or three chambered counting slide with grid.
3. Fecal sample—2 grams minimum. Samples should be warm, moist and soft at collection. Eight to 10 pellets per sample is generally a sufficient quantity.
4. Vial—straight sides, glass or plastic, with cap. Fill with 28 ml (cc) of water and mark meniscus. Add 2 ml (30 ml total) and mark meniscus again.
5. Tongue depressor
6. Medicine dropper
7. Saturated salt solution—prepared

by adding salt to boiling water until salt will no longer go into solution. Iodized salt often leaves a white precipitate and is therefore the least preferred.

Procedure (see diagram below)

1. Fill vial to 28 ml mark with saturated salt solution.
2. Add fecal material until solution reaches the 30 ml mark. Theoretically, 2 grams of material will displace 2 ml of solution. Mashing pellets between thumb and forefinger before adding to solution will facilitate mixing.
3. Use tongue depressor (larger depressors can be split longitudinally) to break up and mix pellets in solution.
4. Cap vial and mix thoroughly by gently inverting several times (do not shake).
5. With eggs evenly dispersed in solution, remove cap and immediately remove a dropperful of material.
6. Holding the slide almost flat with ends of slide between thumb and forefinger, completely fill one chamber. Slightly tilting slide will facilitate filling. Immediately fill dropper again and fill remaining chamber.

7. Allow 1 to 2 minutes for eggs to float to upper surface of the counting chamber.

8. Examine at 100X magnification (10X ocular, 10X objective). Two focal planes exist. Eggs and air bubbles will be in the upper plane. Focus on air bubbles, then locate grid.

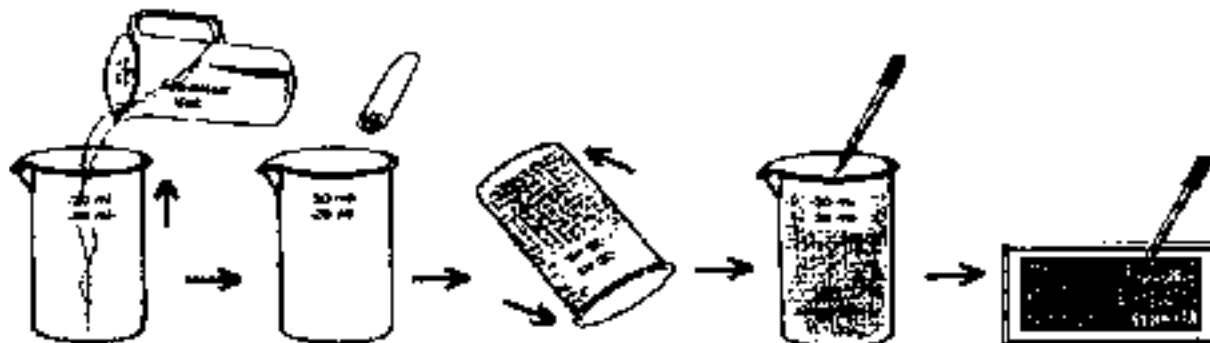
9. Count eggs in each grid. Do not count eggs outside the grid.

10. Calculate number of eggs per gram of feces per diagram below.

Reference

Dunn, A. 1978 Veterinary Helminthology (2nd Ed.). William Heinemann Medical Books Ltd., London

$$EPC = \frac{\text{Number eggs counted}}{\text{number of grids}} \times 100$$



GASTROINTESTINAL PARASITE MANAGEMENT

By Dr. Helen A. Swartz

Missouri State Sheep, Goat and Small Livestock Specialist

Reprinted with permission from the Goat Production Newsletter, February 1999

Introduction

Substantial losses are incurred to goat producers, especially in the summertime, when the roundworms and coccidia plague the goats. The barber pole roundworm that resides in the abomasum (true stomach) is the worst culprit. Also running a close second is the brown stomach worm (*Ostertagia circumcincta*). According to the necropsies performed at the University of Missouri Veterinary Lab, most deaths in the summer occur from the barber pole worms that are blood suckers. Coccidia, not a stomach worm, are often unheard of by the goat producers and they continue to deworm with no success. The losses to coccidia require treatment with Amprolium. By the time the goat producers has identified the problem, the gut lining of the goats is often damaged to the point that no transfer of nutrients can get across the gut to get into the blood stream. In that case, stunting usually occurs and it takes weeks to re-instate a healthy gut lining. In goats, bloody stools are rarely observed. Fecal samples should be taken to your local veterinarian for analysis to distinguish stomach worms eggs from coccidia eggs.

Symptoms

The roundworms are blood sucking parasites that cause anemia and therefore "bottle jaw" is observed in many cases. By then, the animals are very anemic. Pull down the eyelids and look at the gums of your goats if you suspect stomach worm infestation. One thousand barber pole worm larvae can suck up to 800 cc of blood per day. Goats are much more susceptible to stomach worms than sheep. Kids are much more prone to die from stomach worm infestation than adults because they have not had time to build any immunity. Diarrhea may occur with stomach worms but often the goat dies

before diarrhea occurs. Other symptoms include unthriftiness, thin animals (feel their ribs), loss of weight, no growth and a marked decrease in milk production.

Life Cycle of Worms

The life cycle of stomach worms and coccidia depends upon a number of variables. Eggs do not overwinter in a hard winter with very low temperatures below zero for lengthy periods of time. In some winters, they do overwinter but the barber pole worms don't like cold weather. Eggs hatch and pass through three larval stages, L1, L2 and L3, which is the infective stage when ingested. Barber pole eggs love the hot, moist weather in Missouri. They do not thrive well in cold or very hot, dry conditions. Sun will sterilize the eggs in hot weather when it is dry and the grass is short. When the grass is tall and the dew is observed in the mornings, the L3 crawls up the blades of grass and are eaten by the goats.

Arrested Development

The arrested development of barber pole larvae in the abomasum (true stomach) of the goat is a process where they hide and burrow down in the gut lining and don't become adults until several months later. Deworming will arouse these arrested larvae and if a dewormer is drenched or injected, the arrested larvae will erupt out of the gut and 7 to 10 days later the goat producer has another bout with blood sucking, anemia, and loss of animals, especially kids. In the hot summer months, it is best to use a dewormer that kills not only the adult worms that are laying eggs but also the arrested larvae. The worms take about three weeks to complete their cycle. If a goat producer deworms his does or nannies and turns them right back on the same pasture loaded with L3 infected larvae, it only takes a short time for the eggs to mature to the blood sucking stage and losses continue to occur.

Diagnosis

Identification by your veterinarian of worm eggs under a microscope from fecal material you have collected out of the rectum of your goat takes only a few minutes. When the number of nematode eggs per gram of feces reaches 600 to 1000, the goats have adults in the gut laying eggs and more than likely are sucking blood.

Deworming

Few dewormers are approved for goats. With a good client-patient relationship with your local veterinarian, you can use most any dewormer he/she would recommend. Benzimidazoles are dewormers from the same family, such as: thiabendazole, fenbendazole, oxfendazole, albendazole. Research has shown that these dewormers should be doubled when deworming goats. When changing dewormers or rotating, use a dewormer that is not from the same family, i.e., benzimidazole, levamisole, Ivermectin, etc. Levamisole is recommended at 8mg/kg or 3.6 mg/lb. for sheep. Goats need a higher dose, so 11 mg/kg (5mg/lb) is recommended for deworming. Ivermectin for sheep is recommended at .2mg/kg or 0.09 mg/lb. Research has shown that the oral form appears to be more effective than the injectable in goats. Morantel is a product similar to pyrantel, the active compound found in the Strongid horse dewormers. There is no milk withdrawal time with this dewormer. Remember, goats are more susceptible to stomach worms and coccidia than sheep.

Worms will become resistant to any dewormer if over used. When you deworm you goats, you will never kill 100% of all of the adult worms in the gut. Those that survive develop a resistance to the dewormer used and the surviving worms begin to proliferate. In time, the total population in the gut will become the resistant stomach worms. At that point in time, you are wasting your time and money deworming your does and kids with the dewormer you have been continuously using. For this reason, it is

Continued on next page

Parasite Mangement
Continued from previous page

best to rotate dewormers. A fecal sample taken to your veterinarian is the best check on resistant worms to a dewormer.

How to Reduce Exposure to Eggs

Stomach worms—Deworm your does in the kidding jugs or at the time of kidding. Does have a post-parturient rise in eggs at kidding time. Clean them up while they are in the barn or if kidding on pasture, deworm and change pastures if possible in two to five days depending on the dewormer. Ivermectin will require a five day waiting period to keep from infecting the pastures with eggs from the dewormed does. Once your pastures are highly populated with L3 larvae from *Haemonchus contortus* (barber pole stomach worms), the entire summer will be spent in fighting the battle of infection. If it becomes dry in July and August and the and the grass and legume pastures are short, some sun sterilization will occur. If you wait to turn the does and kids out on pasture until after the dew is dried from the sun, that will help reduce the L3 infective larvae on the blades of forages.

Coccidia—Coccidia reside in the gut of goats on a continuous basis. It is when the goats become stressed from lack of good nutrition or other factors that the coccidia take over and cause death of the animals. Good nutrition is helpful for controlling coccidia outbreaks in goats and also stomach worms. If you have had a problem with coccidia losses in your herd the previous year, a recommendation is to add Amprolium B to the water at kidding time to reduce coccidia eggs in the gut of the does. This reduction will help protect the kids from infection from the dams allowing them some time to develop immunity as they grow and age. Getting kids started with a creep, especially meat goats, will help them to develop an immune system at a younger age. Antigens that synthesize antibodies are proteins and the young kids need protein to help build these valuable antibodies. In the spring, forages have a high percentage of water in them. The percentage of water in

forages decreases as temperatures rise in the summer time. Kids cannot consume enough forage in a day to get enough dry matter content to utilize the nutrients in the forage to their advantage.

Pasture Management

Kids are more susceptible to stomach worms and coccidia than adults. When grazing kids at a very young age with high exposure to L3 larvae, it is almost impossible to keep down losses. It takes time for the young kids to develop any immunity to stomach worms and coccidia. Clean ground, where no goats have grazed for a year, is the safest. Moving goats from a currently grazed pasture to a pasture where hay has been removed will reduce the possibility of worm burden on the ground. Grazing a contaminated pasture with another specie (not sheep) such as cattle, pigs or horses will help. If you have a rested pasture, worm eggs (L3) will not die off quickly because the pasture is not being grazed to shorten the forage. Deep forage is a haven for stomach worm infective larvae. If you have a pasture resting, it is best to clip it and keep it short. If it is short enough for the sun to reach the soil, it will sun sterilize in less than a month, especially if it is dry.

Dewormers to Avoid During Pregnancy

The process of deworming is stressful to the goats and for the producers. Stressing does or nannies can cause abortions. Avoid deworming in the first 10-60 days. The conceptus is very sensitive to all drugs. Albendazole should be avoided in all stages of pregnancy and some reports of abortion after lavamisole would caution producers to use with care. Deworming in the kidding jug or right after kidding is the best time to clean them up and the does should remain clean when put out on pasture. Kids will not be exposed to infective larvae (L3) on pasture hopefully until they can develop immunity of sorts. Unfortunately, most goats are susceptible to stomach worms and coccidia. Low quality nutrition, poor body condition and stress will provide the stomach worms with an upper hand to result in death losses. On the next page

is a chart of dewormers, not approved for goats, but can be used as dewormers on your goats if you are working with a veterinary with whom you have a good client/patient relationship.

DRUGS FOR CONTROLLING INTERNAL PARASITES (Anthelmintics) ^a

DRUG	Roundworms	Larvae
	Whipworms	Tapeworms
	Flukes	Lung -
		Precau-
		tions
*Albendazole	5-10 mg/kg	
	5-10mg/kg	
10-20 mg/kg	Do not use 1st 3rd of preg-	
nancy-	Valbazen	
		75 mg/kg
		fatal.
*Oxfendazole	5 mg/kg	5 m g /
kg	5 mg/kg	5 mg/kg
5 mg/kg		Do not use
pregnant animals-safe to		
Benzelmin		
		triple dose.
Synthantic		
*Fenbendazole	5 mg/kg	5 mg/kg
5-10 mg/kg	5-10 mg/kg	5 mg/kg
10 mg/kg	Safe in pregnant	
Panacur		
		animals and
Safeguard		
		breeding males.
Thiabendazole	44-66 mg/kg	
		Resistance common.
TBZ		
		Safe in pregnant animals.
*Oxibendazole	5-10 mg/kg	5-10 mg/
kg		Safe in
pregnant animals.		
Anthelcide		
*Mebendazole	13.5 mg.kg	
	13.5 mg/kg	
	Safe in pregnant animals.	
Telmin		
Levamisole	8 mg/kg	8 mg/kg
		Do not overdose or use
Tramisol		
		on milking sheep.
Lavasol		
Morantel	10 mg/kg	

Goat Knoll Farm Field Day

March 20, 1999

A group of 30+ people gathered in Dallas, Oregon at Goat Knoll (home of Paul Johnson and Linda Fox and *CashMirror* Magazine) to learn about goats and visit with other like-minded souls. The event was advertised as a beginner's event, so no major problems of the world were solved or even addressed. The group included people with more cashmere goats than the hosts, people with just a few goats and a few who were contemplating the acquisition of cashmeres.

Participants had been promised a "hands on" experience and a possible live kidding. There were numerous goats to ~~play with~~ learn from (adults and new kids) and one doe came through as promised, producing a noisy new kid during the day—much to the delight of the many eager faces peering over the sides of the kidding stall.

The fiber and records classes were held in the house, but other workshops were held in the barn. Fortunately, we were blessed with a beautiful, sunny, almost warm day so we opened up the big barn doors and let the sunshine in.

The highlights of the day were the homemade cinnamon rolls which welcomed visitors by the sign-in



Before the event—the does "circled their wagons." They told us they were not going to produce kids with an audience! Mostly they did wait—only one doe kidded the day of the event. Eight babies were born the next day.

table and the birth of Bright Eyes—a little tan and white doe born to Ebony, a two-year old, first-time mother.

The first class of the day was presented by the Cashmere Kids 4-H group. This Salem club presented information on goat conformation and condition scoring. They explained why conformation is important

Continued on next page

DRUGS FOR CONTROLLING INTERNAL PARASITES (Anthelmintics) ^a

DRUG	Roundworms	Larvae	Whipworms	Tapeworms	Lungworms	Flukes	Precautions
*Albendazole Valbazen	5-10 mg/kg			5-10mg/kg		10-20 mg/kg	Do not use 1st 3rd of pregnancy-75 mg/kg fatal.
*Oxfendazole Benzelmin Synthantec	5 mg/kg	5 mg/kg	5 mg/kg	5 mg/kg	5 mg/kg		Do not use pregnant animals-safe to triple dose.
*Fenbendazole Panacur Safeguard	5 mg/kg	5 mg/kg	5-10 mg/kg	5-10 mg/kg	5 mg/kg	10 mg/kg	Safe in pregnant animals and breeding males. Resistance common.
Thiabendazole TBZ	44-66 mg/kg						Safe in pregnant animals.
*Oxibendazole Anthelcide	5-10 mg/kg	5-10 mg/kg					Safe in pregnant animals.
*Mebendazole Telmin	13.5 mg/kg			13.5 mg/kg			Safe in pregnant animals.
Levamisole Tramisol Lavasol	8 mg/kg				8 mg/kg		Do not overdose or use on milking sheep.
Morantel Rumatel	10 mg/kg						Safe in pregnant animals.
Avermectin Ivomec	200 ug/kg	200 ug/kg			200 ug/kg		Effective also against external parasites

*Drugs not approved for sheep and goats in the United States—Must have a good client-patient relationship with your veterinarian to use these drugs legally.

^a Note that all dosages are based on active ingredients. Dosages are per kilogram of body weight unless otherwise indicated. To convert to pounds, consider that there are 2.2 lbs. in a kilogram.

Goat Knoll Field Day

Continued from previous page

for the health of your goat and well as for winning awards in the show ring. Using goats in the barn, they presented examples of goats in different condition—scored from a Condition 1 (a very lean goat) to a Condition 4 (which is a fat goat). They couldn't find any "Ones" in the barn, but they found a couple of "Fours," who started their diet the day after the event.

They passed out information sheets to participants illustrating condition scores and also a score card for judging live goat shows which most show judges use. A lot of useful information was presented in a very well-organized manner. The group had obviously spent a great deal of time planning their presentation.

The following workshop should have been entitled "Goat Abuse." Lucky candidates from the barn were used to illustrate trimming hooves, CD&T vaccinations and worming (both pour-on and injectable types). We weren't able to enlist any audience help for the goat maintenance chores, but we have a better plan for the next event to ensure that participants will feel more compelled to "volunteer."

The maintenance workshop was interrupted when a participant noticed that one of the 20+ very pregnant does who had been locked in the barn for the occasion was acting "funny." We dragged her into a kidding stall (gently) so that participants could crowd around both sides to watch the event at close range. The birth was typical, quick and the first-time kidder was a good mother.

After a lunch break, the group divided into two sessions. A fencing group with Paul looked at what Goat Knoll uses to keep its goats out of the neighbors' gardens. While demonstrating testing of an electric fence, Paul could find no volunteer to place an alligator clip on the hot wire and he had no cat available for use for the test. In spite of these setbacks, some basics were discussed with the group sharing ideas and opinions.

Fencing has at least two purposes. One is to keep the goats in and the other is to keep the varmints out. Our fencing consists mostly of 48" stock fence, backed with one strand of electric on a 6" extender approximately one foot off the ground. Several people said they also use another strand of hot wire on top of the stock fence.

Various types of gates were viewed; each type has its good and bad points; choice depends on use and location. Spacing between the bars of a gate is an issue, especially when kids need to be contained.

Everyone agreed that electric wire was very important to keeping goats off the fence and in preventing stuck heads. Other fencing issues discussed in-

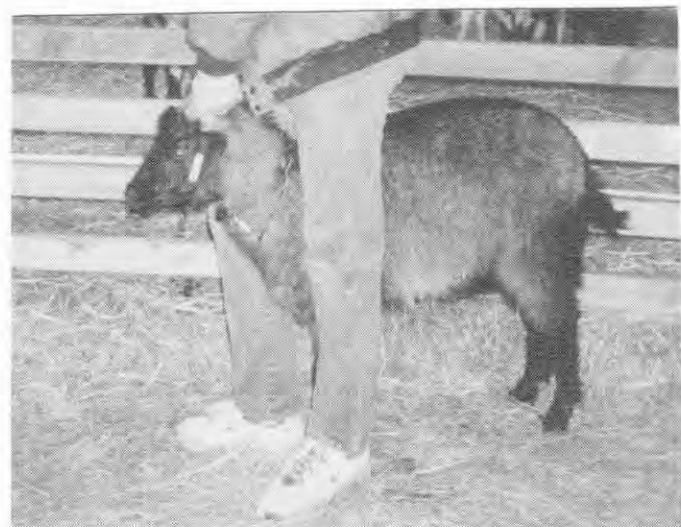
Continued on page 28



The Cashmere Kids conducted an excellent workshop on conformation and condition scoring.



Ebony and her new doe kid, Bright Eyes. They stole the show!



Paul demonstrates the patented Johnson Field Grade Portable Headstall—the method Goat Knoll uses to restrain goats for maintenance if there are two people working together.

Calendar of Events

Association Contacts

May 1, 1999

Northwest All Breed Goat Show

Skagit County Fairgrounds, Mt. Vernon, WA

Classes for all breeds of goats including cashmere - bucks, does, wethers. For more info, contact Kathy Wolner 360-856-6384, email: klamanch@gte.net or Valeri Larm 360-428-5842, email: larm@gte.net

May 1 - 2, 1999

Snake River Fiber Fair (5th annual)

Bonneville County Fairgrounds, Idaho Falls, Idaho

Information contact: Amy Kaser 208-529-3549, email: kaser@srv.net

May 14 - 15, 1999

Rare Breed Livestock, Miniature & Small Pet Expo, (6th Annual), Fairgrounds, Knoxville, Tennessee

Sponsored by Heartsong Triple D Farm. Entertainment, educational seminars and vendors booths. For more information, contact Heartsong Triple D Farm, 1292 Lakemoore Drive, Jefferson City, TN 37760, phone 423-475-3777, email: ddtarr@usit.net

May 14 - 16, 1999

Maine Fabric & Fiber Arts, Festival, conference with seminars, vendors. For brochure send address and 55 cents postage to Christine Macchi, The Fiber Loft, 76 Maine Street, Brunswick, ME 04011.

May 22, 1999

Northwest FiberFest, Evergreen State Fairgrounds, Monroe, Washington.

Wool show, sale and contest, cashmere fleece contest, commercial vendors, livestock and equipment sales, demonstrations, spinning classes. Information contact: Linda Twitchell, 1305 E. Smith Rd, Bellingham, WA 98226, phone 360-398-2778

May 29, 1999

Back of the Wasatch Fiber Festival, Summit County Fairgrounds, Coalville, Utah, Featuring llamas, alpacas, sheep, stockdogs and everybody's favorite: goats! More info: Heide Smith 435-649-3856 (evenings).

May 29 - 30, 1999

Sheep and Woolcraft Fair, Cummington Fairgrounds, Cummington, MA. Contact: Scott Poitras, 128 Washington Road, Brinfield, MA 01010.

American Meat Goat Association

W. E. Banker, President, 512-384-2829

Cashmere America Co-operative

Joe David Ross, Manager, 915-387-6052
fax: 915-387-2642

Wes Ackley (Maine) 207-336-2948

Marti Wall (Washington) 360-424-7935

Cashmere Producers of America (CaPrA)

Kris McGuire, President, 970-493-6015

email: krisvadale@aol.com

Membership info: Marilyn Burbank, PO Box 2067, Rogue River, OR 97537, email: burbank@cdsnet.net

Colorado Cashmere and Angora Goat Association (CCAGA)

Carol Kromer, Club Contact, 719-347-2329

Eastern Cashmere Association (ECA)

Ray Repaske, President, 540-436-3546
cashmere@shentel.net

North West Cashmere Association (NWCA)

Guy Triplett, President, 541-388-1988
harvest@empnet.com

Professional Cashmere Marketers' Association

(PCMA), Tom and Ann Dooling

406-683-5445

ann@MontanaKnits.com

Pygora Breeders Association (PBA)

Darlene Chambers, President

phone: 541-928-8841, fax: 541-928-0246

email: dchambers@proaxis.com

Texas Cashmere Association (TCA)

Dee Broyles, President

806-489-7645 office, 806-489-7959 home

Wild Goat Women

Debbie Walstead, Chairperson, 719-495-2962



Breeders

CANADA

GIANT STRIDE FARM

Pat Fuhr
RR #3
Onoway, Alberta, Canada,
TOE IVO
403-967-4843
email:
giantstride@compuserve.com

LONE PINE FARM

Myrna Coombs
PO Box 863
Onoway, Alberta, Canada
TOE-1VO
780-967-4583

UNITED STATES

CALIFORNIA

HENRY LOWMAN

PO Box 2556
El Granada, CA 94018
650-225-1171
email: hlowman@compuserve.com

COLORADO

MARSHALL'S ORGANIC ACRES

9217 N. County Rd. 7
Wellington, CO 80549-1521
970-568-7941
email: PLCMARSHAL@aol.com

ROLIG GOAT RANCH

Cashmere Producing Goats
Steven or Ellen Rolig
8435 CR 600
Pagosa Springs, CO 81147
970-731-9083
email:
roliggoatranch@pagosasprings.net
Page 26, April 1999

IDAHO

SHREFFLER TARGHEE & CASHMERE

Ken & Loyce Shreffler
589 Center Valley Road
Sandpoint, ID 83864
phone & fax: 208-263-5038
email: loyce@micron.net

KENTUCKY

OCTOBER FARM III

Dick and Dottie Gould
764 Shacks Branch Rd.
Jackson, KY 41339
606-666-4878
email: octfarm3@se-tel.com

MAINE

BESSEY PLACE CASHMERE

Wes and Marilyn Ackley
319 Brock School Road
Buckfield, ME 04220
207-336-2948
email: ackley@megalink.net

BLACK LOCUST FARM

Yvonne Taylor
PO Box 378
Washington, ME 04574
207-845-2722
email: Lance@airs.com

GRUMBLE GOAT FARM

Linda N. Cortright
574 Davis Rd.
Union, ME 04862
207-785-3350
fax: 207-785-5633
email: grumble@midcoast.com

HARDSCRABBLE FARM

Hattie Clingerman
PO Box 682
Winterport, ME 04496
207-223-4211

MARYLAND

MIDDLETOWN FARM

George and Barbara Little
8123 Old Hagerstown Rd
Middletown, MD 21769
phone & fax: 301-371-8743
email: glittle640@aol.com

MINNESOTA

THE WINTER FARM

Vicki Biggs
122 Caspers Hill Rd.
Grand Marais, MN 55604
218-387-1913
email: momsUPER@boreal.org

MONTANA

CASTLE CRAGS RANCH

Diana Hachenberger
894 Pheasant Run
Hamilton, MT 59840
406-961-3058
fax: 406-961-4770

EDENS,

DAN AND SHERYL

1825 Sierra Rd E.
Helena, MT 59602
406-458-5317
email: edensdan@initco.net

J & K CASHMERES

Jim Haman & Kathy Sumter
604 2nd St. S.W.
Park City, MT 59063
406-633-2210
fax: 406-633-9157

SMOKE RIDGE CASHMERE

Craig Tucker
Yvonne Zweede-Tucker
2870 Eighth Lane NW
Choteau, MT 59422
406-466-5952
Fax: 406-466-5951
email: smokeridge@marsweb.com

NEBRASKA

AIRY KNOLL FARMS, INC.

Richard & Harriet Jensen
76460 Road 424
Cozad, NE 69310
308-784-3312

HI-PLAINS CASHMERE

Julie and Alex Becker
160482 County Road C
Mitchell, NE 69357
308-623-2627
email: ajbecker@PrairieWeb.COM

SANDHILLS CASHMERE

Mark and Karen Crouse
Box 595, East Point Drive
Bingham, NE 69335
308-588-6248
fax: 308-588-6236
email: fibergoats@aol.com

NEVADA

ROYAL CASHMERE

Eileen Cornwell
419 Centerville Ln
Gardnerville, NV 89410
702-265-3766
Fax: 702-265-1814
email: cashmere@sierra.net

NEW JERSEY

BLACK FEN FARM

Virginia Hinchman
Kevin Weber
117 RD 2, Rt. 46
Hackettstown, NJ 07840
908-852-7493
fax: 908-852-1336 (call first)
email: blackfen@juno.com

Directory

NEW MEXICO

DOUBLE EYE FARM, INC.

Sanford Bottino
PO Box 218
Ojo Caliente, NM 87549
505-583-2203

OHIO

TAMARACK RANCH

Bob and Ann Wood
12000 Old Osborne Road
PO Box 567
South Vienna, OH 45369-0567
937-568-4994
email: tamarack@erinet.com

OKLAHOMA

TEXOMA KIDS & CASHMERE

J. D. and Karen Chandler
Rt 1, Box 37
Mannsville, OK 73447
580-371-3167
fax: 580-371-9589
email: jkc@flash.net

OREGON

CASHMERE GROVES

Pat Groves
16925 S. Beckman Rd.
Oregon City, OR 97045
503-631-7806
email: pgroves@europa.com

FOXMOOR FARM

Carol and Carrie Spencer
1178 N.E. Victor Point Road
Silverton, OR 97381
Phone: 503-873-5474
Message: 503-873-5430
email: foxmoorfarm@juno.com

GOAT KNOLL

Paul Johnson/Linda Fox
2280 S. Church Rd.
Dallas, OR 97338
503-623-5194
Fax: 503-624-1704
email: goatknol@teleport.com

HARVEST MOON FARM

Guy and Karen Triplett
63300 Silvis Road
Bend, OR 97701
541-388-8992
email: harvest@empnet.com

HAWKS MOUNTAIN PYGORA'S

Lisa Roskopf & George DeGeer
51920 SW Dundee Rd.
Gaston, OR 97119
503-985-3331
Fax: 503-985-3321
email: lisa@hmrpygoras.com

HOKULANI FARMS

Cynthia and Karl Heeren
22260 East Highway 20
Bend, OR 97701
541-388-1988
email: hokulani@bendnet.com

K-T CASHMERE GOAT FARM

Kitty and Tom Hanczyk
33758 Totem Pole Rd.
Lebanon, OR 97355
541-258-5857
email: toolguy@dnc.net

MCTIMMONDS VALLEY FARM

Janet and Joe Hanus
11440 Kings Valley Hwy.
Monmouth, OR 97361
503-838-4113
email: janhanus@open.org

NORTHWEST CASHMERES

Carole Laughlin
21935 SW Lebeau Rd.
Sherwood, OR 97140
503-625-8816

OVER THE RAINBOW FARM

Deb Miller
95150 Turbow Ln.
Junction City, OR 97448
541-998-3965

ROARING CREEK FARMS

Arlen and Cathy Emmert
27652 Fern Ridge Road
Sweet Home, OR 97386
503-367-6698
email: cashmere@proaxis.com

SOMERSET CASHMERE

Julie and Jim Brimble
12377 Blackwell Rd.
Central Point, OR 97502
541-855-7378
email: brimble@cdsnet.net

SUNSET VIEW FARM

Jean Ferguson/Carolyn Bowser
4890 Sunset View Ln. So.
Salem, OR 97302
503-581-9452
email: carolbow@open.org

PENNSYLVANIA

SANDRA ROSE CASHMERES

Jim and Sandra Rebman
RR 2, Box 279
Palmyra, PA 17078
717-964-3052

TEXAS

FOSSIL CREEK FARM

Norman and Carol Self
1077 Cardinal Drive
Bartonville, TX 76226-2620
940-240-0520
fax: 940-240-7024
email: NTSELF@MSN.COM

WILDBERRIES FARM

Barry Steinberg
171 CR 153
Whitesboro, TX 76273
903-564-9776
fax: 903-564-9152

VIRGINIA

FOGGY BOTTOM FARM

Marilee and John Williamson
Rt. 2, Box 223AA
Buchanan, VA 24066
540-254-1628
email: mhwabc@juno.com

RANEY DAY KIDS

Craig and Lucy Raney
3627 Va. Ave.
Goshen, VA 24439
540-997-1121
Fax: 540-997-1124

STONEY CREST FARM

Anne and Roy Repaske
570 Paddy's Cove Lane
Star Tannery, VA 22654
Phone/fax: 540-436-3546
email: cashmere@shentel.net

WASHINGTON

BREEZY MEADOW CASHMERE FARM

Douglas and Roberta Maier
810 Van Wyck Rd.
Bellingham, WA 98226
360-733-6742
email: fibergoat@earthlink.net

BROOKFIELD FARM

Ian Balsillie/Karen Bean
PO Box 443
Maple Falls, WA 98266
360-599-1469 or
360-715-1604

KELLERS KRITTERS

Kay Keller
11030 Grandview Rd.
Arlington, WA 98223
360-435-6123

Continued on next page

CASHMIRROR

Breeders Directory

Continued from previous page

MORE WASHINGTON

LIBERTY FARM (NLF)

Cliff and Mickey Nielsen
1505 Nile Road
Naches, WA 98937
509-658-2502
email: Cnielnlf@aol.com

RAINFLOWER FARM

Sue Lasswell
37003 Mann Rd.
Sultan, WA 98294
360-793-9590
email: Rainflower@compuserve.com

STILL WATERS CASHMERE

Moon and Diana Mullins
PO Box 1265
Twisp, WA 98856
509-997-2204/509-421-3107
email: dmullins@methow.com

WALLFLOWER FARM

Dan and Marti Wall
16663 Beaver Marsh Road
Mt. Vernon, WA 98273
360-424-7935
Fax: 360-428-4946
email: cashmere@sos.net

WINDRIDGE FARM

Becki and Jim Belcher
202 Clemans View Rd.
Selah, WA 98942
509-698-3468

Internet listing of these breeders can be found on the net
at: <http://www.teleport.com/~goatknol/breeders.htm>



Cynthia Heeren spinning a fine cashmere yarn.

Goat Knoll Field Day

Continued from page 24

cluded testing the electric fence, bracing, spacing and how to integrate existing fence in your program with the minimum outlay for new materials. Another good suggestion was to bury a strand or more of fencing to prevent coyotes and other predators from digging under a fence. Also discussed were "goat proof" latches and a goat's ability to open it.

In spite of Paul's attempts to electrocute the participants, the session was good and included valuable input from all. Paul also failed in his thinly-disguised attempt to get everyone to participate in a T-post pounding contest.

And...while the fencing people were out having a good time, a small but dedicated group huddled around the computer with Linda and discussed recordkeeping. The group seemed more interested in keeping records on their animals than for their government, so our efforts focused there. The group looked at examples and forms for paper-based records as well as examining the possibilities when the herd's information is entered into a data base. Computer records make sorting by different criteria easily accomplished. Also, various data fields can be selected for reports and other calculations. Any data base program can be used (we use Microsoft Access) for your data entry and if you set up your own data base fields, you can set up information that *you* think is important to track.

The next workshop focused on fiber. Cynthia Heeren, Hokulani Farms, Bend, Oregon, gave an excellent presentation covering cashmere fiber topics. She explained what to look for in good cashmere. She passed around samples of good and bad cashmere. Of course, we all remember when we were beginners and we were lucky to tell the guard hair from the cashmere, but everyone has to start somewhere. Cynthia had yarn and finished garments on display

Continued on next page



Cynthia Heeren talks about the fiber.

Goat Knoll Field Day

Continued from previous page

and demonstrated spinning cashmere. Four spinning wheels beckoned participants to try their hands at spinning.

And then, it was back out to the barn for the fiber harvesting session. A not-so-eager goat had been saved to demonstrate shearing. Paul expertly (although not very quickly) demonstrated removing a goat's fleece without seriously harming the goat. Linda turned into the portable headstall for this event. A real headstall, which all the smarter goat owners use, was on display as well.

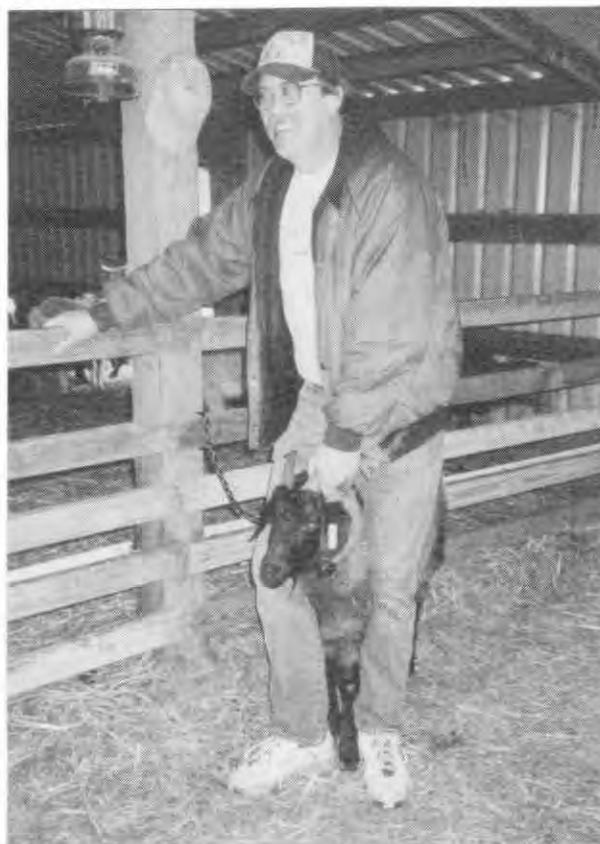
Carol Spencer, Foxmoor Farm, Silverton, Oregon, was the instructor for the cashmere combing demonstration. She chose a lucky goat from seven fleece-bearing wethers and Paul caught him and tied him to a post in the barn. For one person, performing maintenance chores alone, we use a snap-on collar attached to a short leash attached to a barn post. The goat can be quickly snapped into place for hoof trimming or other maintenance chores.

Carol demonstrated her method and tools for combing the cashmere from a goat. Unfortunately, this goat chose to lay down so the job was more difficult. However, after just a few minutes, she had quite a bit of cashmere in her brown paper bag. She explained that it is important to first comb the goat with a soft, natural bristle brush to remove hay and other undesirables from the goat's fleece. Then, using

a large pin brush, loosen the goat's cashmere. Finally, using an 8" large-toothed metal comb, pull out the cashmere in handfuls. Working down the goat on one side and then the other, you can usually harvest the majority of the cashmere in 30 minutes. It is important to harvest at just the right time. Carol had available an excellent handout on how to comb and hand-dehair

your fleece.

The final sessions planned on more records (yawn) and an internet surfing session didn't happen. The day was late, the participants' heads were full, the cinnamon rolls were gone, and the goats wanted out of the barn.



Paul Johnson restrains his shearing candidate while the shearing assistant hunts for a tarp to put down to keep the fleece clean. A board which you can sweep between victims works better, but in a pinch, a tarp will work.



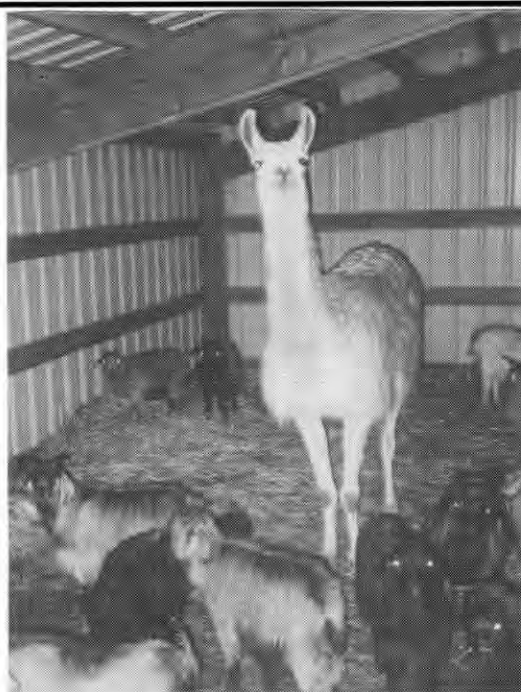
In an effort to avoid losing his cashmere, this goat layed down. It didn't work—Carol combed him anyway.



Carol Spencer demonstrates harvesting cashmere from a goat by combing. Most goats will be more cooperative.

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and the
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