

Little Hooves 4-H Club
Suffield, CT
Getting Ready for Foaling Season at On Target Miniatures

Foaling season is usually in the spring, from March through June, and is a time of both excitement and stress. Mares were bred the previous spring, so it has been a long wait and there are still a lot of things that can go wrong. That is why it is stressful, but the arrival of a healthy foal makes it all worthwhile.

Steps in preparation:

First step is to try and determine WHEN the mare might foal, which can be anywhere from 285-350 days (or even more) from when she was bred. Miniature mares seem to foal a little earlier (on average) than “big” horses. Once mares reach about 250 days they should be checked for changes in the udder. This is usually the first change seen before giving birth and usually happens 2-4 weeks before the foal arrives. Foal movement can usually be felt at this time by placing a hand just in front of the udder, especially right after the mare eats. Among On Target Miniatures mares in 2012, Toffee reached 250 days January 14, when Mira was at 230 days and Sox was at 220 days. Yes, they are all due within a month of each other!

Preparing a foaling stall: Mares need a large, clean and very safe place to foal, such as a regular size horse stall. Every inch should be inspected to assure there is no place that a foal can get caught or hurt. Straw is the best bedding because it won't stick to the wet foal or get in the nose. It can be put down at the very last minute though. The mare should be put in the stall to get her used to it prior to foaling (by day 285 anyway), but knowing exactly when to do this has to be based on a best guess! We like to install a camera and link the feed to www.marestare.com (look for On Target Miniatures under Public cams/live cams) where anyone can watch not only our mares but pregnant animals all over the world! Our mares will also be wearing foaling monitors which will page us whenever they lie down on their sides. It is much better to get up several times in the night to check than it is to miss a birth!!! Of course, this only adds to the stress.

Foaling kit: Everything needed for foaling should be put in a kit and kept where it is very handy to the foaling stall. Our kit includes:

1. List of emergency phone numbers (which are also entered in the cell phone). DO NOT RELY on your memory!! Include vets, back-up vets, and friends with experience. Make sure they all know about when the mares are due.
2. Milk test strips if you plan to use them, which can help predict the time of foaling
3. Lubricant in case the foal is stuck or in the wrong position
4. Towels to dry the foal
5. Pain killer (Banamine) and wormer to give mare right after she foals (already measured out and ready to give)
6. Child enema for the foal (if needed)
7. Betadine solution in a film can to treat the umbilical cord
8. Scissors
9. Foal blankets
10. Booklet on foaling for reference
11. Vet wrap to wrap the mare's tail and keep it out of the way for foaling
12. Camera to take lots of pictures

The Actual foaling:

Checking the milk is one way to tell that the mare is close to foaling as the colostrum she produces near foaling is darker and stickier than the milk she produced earlier. The colostrum will be critical for the foal in the first 24 hours of his life. The udder will often get very full and even feel hot and tight right before foaling. The mare may get restless (or not!) right before she foals; she may lie down and get up, kick at her belly, and/or sweat. If you see this on the camera and you know the mare is close to foaling – CALL US. We have had calls from as far away as Europe that have turned out to be false alarms but we were still very grateful.

Once actual labor starts with the breaking of the water bag, things SHOULD progress very rapidly. The foal should present with the two front legs (one slightly in front), hooves down, and the head between them. Any other presentation indicates a problem and could result in the camera being turned off. The foal should be delivered within 30 minutes or less of the water bag breaking. If the camera stays off for this long, it is likely there is something very wrong.

Once the foal is delivered, he should try to get up almost immediately and be on his feet within an hour. He should then start looking for milk and should nurse within 2 hours of birth. He might need help with this, such as milking some into a syringe and feeding him. The rich colostrum contains antibodies that the foal needs to fight infection. The stump of his umbilical cord (which usually breaks by itself) should be treated with Betadine or other disinfectant, and he should be watched for a few hours to see if he needs that enema in the foaling kit. Both the mare and foal should be watched closely for at least the first 24 hours, but it is also important to let them have time alone to bond. Watching on the camera is greatly encouraged.

Advanced foaling/breeding: (For older 4-Hers):

More foaling information at: <http://www.starsminiatures.com/foalarticle.html>

Predicting due dates: <http://www.lilbeginnings.com/info/breeding/foaling/index.html>

Mares were last bred: Toffee on 5/8/2011, Mira on 5/28/2011 and Sox on 6/7/2011

Calculate due dates based on 320 days and 285 days (to know when to start watching)

Foal coat color calculator: <http://www.animalgenetics.us/CCalculator1.asp>

Colors are:

Sire of all foals (Buckshot): sorrel/chestnut, tobiano/splash; heterozygous for agouti (that makes bay or buckskin), non-silver carrier, heterozygous for tobiano and splash (may not pass those on)

Mares:

Toffee: Bay, tobiano/splash (or she could be tobiano/frame); heterozygous for red factor, agouti, tobiano and splash.

Mira: Genetically she is silver bay, frame overo and carries gray, so you need to check that box. Homozygous for black (EE: she cannot have a chestnut or red-based foal). Unknown if heterozygous for agouti, heterozygous for silver and gray.

Sox: Black tobiano/sabino, heterozygous for black (red carrier)

Some of the information on our horse's color is from testing and some is from knowing what color foals they have produced or what color the sires and dams were. For example, Sox's foal Rusty is "red" so Sox must be heterozygous for black in order for her to pass on a "red" gene. Mira was color tested since she is gray and could be almost any color, so we know she is homozygous for black. She cannot be homozygous for gray because only her dam was gray: her sire was a bay pinto.

What color foals can we expect? And when?

Glossary: Explanation (Genetics)

Homozygous: When both copies of a gene (called alleles) are the same (hence homozygous), then that individual has only one choice of gene to pass on. Heterozygous is the case when the individual has 2 different choices to pass on, from different "alleles" for the same trait. Some genes are "dominant" and will be expressed with one copy, even if the other copy is different but "recessive". The combination of alleles that is passed on determines how the foal will look. Base coat color in horses is a good example: Only 2 basic colors are possible: black (which is dominant, designated E) and red (recessive, or e), All horses are either EE, Ee (both result in black base color) or ee (red base color). EE and ee are both homozygous and Ee is heterozygous. Colors other than black and red (chestnut) result from modifiers (agouti, silver, cream, gray) or patterns (pinto, appaloosa).

Club leader: Mary Adams, e-mail targetsmom@cox.net