

Animal Sciences **Horses**

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Introduction to Horse Health

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To keep your horse healthy, it is important to vaccinate it against certain diseases, deworm it regularly, and properly care for the teeth and feet. Horses are also susceptible to conditions such as colic and laminitis, which can greatly diminish the horse's usefulness, or even end in death. The purpose of this paper is to give you an overview of health issues facing horse owners. The best advice is to establish a regular health care program with a local veterinarian who has interest and expertise with horses. Let the veterinarian help you make health care decisions. It is also important to find a farrier who you are comfortable working with and who can help you make decisions regarding the care and maintenance of your horse's hooves.

Vaccinations

All horses should be vaccinated annually against tetanus, eastern and western encephalomyelitis, and rhinopneumonitis. Depending on your location, the number of horses on your facility, the age of the horses, and the exposure to other horses, it may be advisable to vaccinate for additional diseases. If your horse wounds himself, especially a puncture wound, it is suggested that the horse receives tetanus antitoxin, even if it was vaccinated for tetanus earlier in the year. Talk to your veterinarian to design a vaccination program that is most appropriate for your situation.

Before you buy a horse, have a Coggins test performed to be sure it is not a carrier of Equine Infectious Anemia. There is no vaccine or cure for this viral disease, so many shows, sales, and farms require a negative test to participate in their activities. If you are planning to transport the horse across state lines, state transportation laws require that you have a Coggins test performed. The horse must test negative. It is important to take the paperwork with you on the trip, as you may be asked to show evidence that the horse has been tested negative.

Control of flies, mosquitos, opossums, and birds is a big part of minimizing disease. They are the carriers of the

disease causing organisms. Proper manure disposal, proper composting, removal of standing water, and keeping the area sanitized helps reduce infestation and spread of disease.

Parasite Control

Horses are susceptible to internal parasite infestation. Parasites can be controlled through regular deworming programs, and proper waste and pasture management. Some indications of parasite infestation are weight loss, rough hair coat, loss of appetite, listlessness, tail rubbing, and colic. The most prevalent parasites are:

- strongyles (bloodworms),
- ascarids (roundworms),
- bots, and
- pinworms.

It is recommended that your horse be dewormed four to six times per year. The frequency of deworming needed varies based on herd size and stocking rate (number of animals/acre), as well as the age of the animals. For example, a large number of horses in a small pasture need to be dewormed more frequently than a small number of horses in a large area. It is also recommended that young horses be dewormed on a more frequent schedule. Consult with your veterinarian to develop a deworming program that is best suited to your situation.

The common methods of deworming are:

Feed additives

- If the additive is in the daily feed, it will need to be boosted with a bolus deworming treatment periodically.

Oral tubes of paste

- Most deworming medications are now available in easy to use tubes.

Stomach tubes

- This method involves passing a tube through the horse's nose and into its stomach, so should only be performed by a veterinarian.

When developing a deworming program, it is necessary to rotate the type of anthelmintic (deworming medication) used because parasites can develop a tolerance to compounds over time, and eventually become resistant.

External parasites such as lice, ticks, grubs, and ringworm are seldom a problem if the horse is kept clean and groomed regularly. If external parasites do become a problem, contact your veterinarian for recommendation on treatment.

Dental Care

The horse chews its food in a grinding fashion, and thus evenly wears off the surface of the molars. In some situations, the horse does not evenly wear its molars, and points can form, making eating painful because these points irritate the tongue and cheeks; therefore, the horse chews less, and feed is utilized less efficiently. When points occur, they need to be floated (filed off) (Figure 1), and then the horse will eat comfortably again. Indications of sharp points on the molars are weight loss, whole kernels of grain in the manure, and slobbering while eating.

Some horses also develop wolf teeth on the top jaw just in front of the first molars. These two teeth are not rooted and can be easily removed by a veterinarian or equine dentist if they cause discomfort. Problems with wolf teeth are usually noted when the horse is ridden with a bit, which can bump against the teeth and cause discomfort.

Although uncommon, horses can also develop abscesses, impacted teeth, or a variety of other dental problems. Teeth should be checked at least once a year for the presence of any of these problems. It is especially important to check the teeth of older horses regularly, as they are more likely to have dental problems requiring the attention of a veterinarian skilled in equine dentistry, or an equine dentist.



Figure 1. Floating a horse's teeth.

Hoof Care

The function of the horse's hoof is to act as a shock absorber. Accordingly, it is important to keep them pliable and in good condition, which can be achieved through routine farrier care. Because your horse's hooves grow 3-5 inches per year, the hooves need to be trimmed by a farrier every 6-8 weeks. Not all horses need to be shod (wear shoes). Whenever the wall of the horse's foot is wearing off faster than it is growing, it needs to be protected. If you plan on riding on rough surfaces, along roads, going to shows, etc., then you should put shoes on the horse.

A horse's feet can become very brittle in dry conditions, so the horse may need to stand in mud or water to put moisture back into the hooves. Many moisturizer hoof dressings are available that can be applied to the top of the horse's hoof, but their effectiveness can be questionable. Consult with your farrier or veterinarian regarding treating dry and brittle hooves.

Horses that stand in dirty, manured mud and bedding run the risk of the disease thrush. This is a bacterial disease of the frog of the horse's hoof and can cause lameness. You will recognize the black color and the foul odor as symptoms associated with thrush. The damaged hoof should be pared out and copper sulfate or lime applied to dry it out and kill bacteria. The horse should be moved to a dry site.

Colic and Laminitis

Colic and laminitis are two of the most devastating diseases facing horses, and good management can reduce the incidence of either disease. Colic is a general term for severe abdominal discomfort which takes one of three primary forms:

Gas colic

- A build up of gas in the gastro intestinal tract.

Impaction colic

- Blockage of the intestinal tract preventing normal movement of the digesta.

Twisted colic

- A part of the gastrointestinal tract becomes twisted, causing pain and potentially permanently damaging or killing part of the GI tract.

Some signs you may see if the horse is experiencing abdominal pain are:

- Frequent turning and looking at the sides and abdomen.
- Kicking at the abdomen.
- Refusal of food.
- Frequently getting up and down and possibly attempting to roll.

If your horse appears to be experiencing abdominal pain, contact your veterinarian immediately. Treatment of colic is most successful if it is undertaken immediately. If the horse is trying to roll, it is a good idea to slowly walk the horse until the veterinarian arrives to examine the animal. If the horse is

not attempting to roll, it is fine to leave it standing or lying quietly in its stall.

Feeding your horse adequate forages, and high-quality feedstuffs, will help to minimize the likelihood of colic. Internal parasites can also cause colic, so an effective and regular deworming program is important to prevent colic.

Founder or laminitis is the most serious disease of the hoof, and is a severe inflammation of soft tissue in the hooves that may result in permanent damage to the hooves. As the soft tissue swells, it applies pressure on the top of the coffin bone located in the hoof of the horse. This pressure can result in permanent damage to the hoof. Overfeeding, stress, systemic illness, or a variety of other factors can cause laminitis. When a horse is suffering from acute laminitis you may see:

- Shifting of the weight off the front feet.
- Heat in the front feet.
- General signs of distress.

Talk to your veterinarian to learn how to prevent laminitis. If you are purchasing a horse, watch for rings around the hooves that may indicate that the horse has had laminitis in the past.

Exercise

Exercise for the horse takes various forms. Riding, driving, lungeing, and turning out the animal are all satisfactory methods. If your horse is kept outdoors, it will exercise to some degree by walking around. However, if your horse is stalled, it should get out for at least 60 minutes each day.

You cannot allow a horse to stand in a stall, or not be ridden, for months and expect to go riding for 3-4 hours without problems. Remember, the horse is an athlete and requires conditioning to be fit as well as warming up before any type of stressful activity. The walking around the horse does in a pasture will not condition it for heavy riding. Conditioning horses is based on the same principles as conditioning yourself, so keep that in mind when determining if your horse is fit enough for a particular activity.

Never allow your horse to eat a meal or drink unlimited water immediately after exercising because this can cause colic or founder. The most effective way to cool the horse out is to remove the tack, hose the horse down to remove sweat and dirt, and walk the horse at its own pace, allowing it to take a few sips of water periodically. Once the horse is completely cooled out, it can have as much water as it desires. Grooming or hosing-down the horse after exercise will remove sweat and dirt, and provide an opportunity for you to examine the horse and make sure it didn't receive any injuries during the exercise period. Putting the horse away clean will also reduce itching and irritation to its skin, and improve hair coat quality.

Summary

Purchasing a horse is a big commitment. You are now responsible for the health and well-being of another living thing. It is important that you regularly observe your horse to notice any changes in behavior that may be a sign of illness or discomfort. Developing a good relationship with an equine veterinarian will help you develop a preventative health care program that will insure that you and your horse can participate in the activities that induced you to buy a horse.

Refer to the listed publications for further details. Contact your county Extension office, or the Extension Web site, for copies of these and other publications on horse management.

For more information:

AS-418 Fencing for Horses in Indiana

AS-552-W Introduction to Body Condition Scoring

AS-554-W Introduction to Horse Management

AS-553-W Introduction to Horse Housing

DVD-4-H-995 Our First Horse: Considerations before you Buy DVD; <http://www.ourfirsthorse.info>

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