

Environmental Protections and Handling for Routine Medical Procedures

Our topics for this week are:

- Fly masks
- Blankets
- Stall and stock restraints
- Being cast in a stall
- Cradles
- Side sticks
- Grazing and cribbing muzzles
- Cribbing collars
- Bibs
- Neck straps

ENVIRONMENTAL PROTECTION

Fly Masks

Fly masks are used to protect the horse's eyes from irritation by flies. They are also used to protect the eyes from flying debris during high winds or when traveling in stock trailers. In addition, they can reduce the risk of squamous cell carcinomas (eye cancer) in susceptible horses.

See-through, insect barrier face masks for horses should be clean with soft points of contact with the skin. There should be darts or rounded inserts to prevent the mask from touching the eyes and eyelashes. Proper fitting allows a finger to fit under the mask at all contact points. Attachments are usually hook and loop (Velcro). The horse must be desensitized to the ripping sound of detaching hook and loop attachments before it can be expected to wear a fly mask.

Before each use the mask should be checked for dirt in the mesh to be cleaned and for damage from prior use. Fly masks should not be left on overnight. A second mask should be worn while the first is one drying from being cleaned. Wet masks should not be worn.

Blanketing

Horse blankets (not to be confused with saddle blankets) are often used to prevent show horses from growing a winter coat. They can be used to keep horses warm in cold weather, but if healthy horses are allowed to acclimate to colder weather, blankets are unnecessary. However, once blankets are used for a couple of weeks, they will reduce a horse's ability to adapt to cold weather and then necessitating continued blanketing.

Blankets have the disadvantages of causing rub injuries and facilitating infection, restricting movement, entrapping legs, and causing overheating and chilling. On the other hand, blankets may be needed for sick or elderly horses, on horses riding in stock trailers in cold weather, or on horses that have been clipped. Clipping may be necessary in horses that do hard work in winter and sweat. Clipping aids in drying them and blankets are needed to keep them warm when not working. Blankets should be considered for any horse when temperatures go

below 0°F. Light weight blankets with tight mesh may be used for control of fly bites.

A halter and lead rope should be on the horse in advance of putting blankets on or off, or during adjustments. Blankets have two cinches: a front and back cinch. The front cinch should always be fastened first going on and unfastened last coming off. Caution is needed when horses with long hair coats and synthetic fiber blankets are being adjusted or taken off because of static electricity. When reaching underneath the horse from the left side to grasp the cinches, the handler should face forward to reduce the risk that if the horse kicks, it might kick the handler's head.

Horse blankets can be *standard cut* for stock horses or *European cut* for horses with narrow shoulders. They may have an "open front" which is closed by buckles or snaps or "closed front" which has to be lifted over the horse's head. Closed front blankets can be put on quicker and are stronger but are not as adjustable and some horses may not adjust to having the front placed over their head. Insulating fiber strength is measured in Denier. Higher Denier numbers reflect coarser fibers and greater strength.

HANDLING FOR ROUTINE MEDICAL PROCEDURES

Most handling and restraint of horses can be and should be done WITHOUT tranquilization, sedation, hypnosis, or anesthesia. However, some handling and restraint procedures should be restricted to veterinary medical professionals due to the potential danger to the animal or handler. These require special skills, equipment, or facilities, and possibly adjunct chemical restraint or complete immobilization by chemical restraint.

Restraint of Individual Horses or Portions of Their Body

Whole Body

Stocks and Stall Corners

Stocks are standing stalls for examination and treatment of horses. The dimensions for average saddle horses are 36 inches wide, 84 inches high, and 88 inches long. There is a gate at each end. Horses are led into the stocks from the back gate and when done, they are led forward out the front gate.

Stocks are the safest method of physically restraining horses. Forward, backward, and side to side movement is restricted while in stocks, but the safety of horse stocks should not be overestimated. Horses can rear and strike over the front gate and they can kick over the back gate, if not further restrained.

If mares with nursing foals must be restrained in stocks, the stock should have a small pen attached to the front of the stocks, so the mare and foal can be face to face until the mare can rejoin the foal.

To move a horse into a stock, the horse is led into the stock with both gates open, as if going through it. After the handler walks through and passes the front gate, in a calm and quiet manner the front gate is closed first and then an assistant closes the hind gate. After the hind gate is fastened, the horse's lead rope can be tied. A horse should not be driven into a stock from behind with a front gate closed, or with the handler attempting to lead the horse from the side of the stock.

A halter and lead rope should always be left on the horse. A handler must never approach a horse in a stock while in its blind spot (directly behind it) and startle the horse. A handler or assistant should remain with the horse at all times while it is in stocks.

If stocks are not available, a horse can be backed into a flat walled, strongly built corner with a ceiling that is high enough that it will not hit its head if it rears. The corners of most box stalls are sufficient. Having the horse's rump in the corner prevents backing and avoidance with right or left movement of its rump. The handler should face the horse standing at 45 degrees to a shoulder to psychologically inhibit forward movement and re-enforce with his voice, halter and lead, and distraction techniques. If a procedure must be done on or near the horse's rump, such as rectal palpation, makeshift stocks can be made of hay or straw bales for protection of the handler.

Cast in a Stall

Some horses, particularly younger ones, will sometimes attempt to roll in their stall. When they do, there is a risk of being cast in a stall, i.e., rolling 3/4 of the way over next to a wall and becoming entrapped from being tipped on their backs with their legs folded against a wall. In this position, they cannot push themselves back or away from the wall, and they will panic, thrashing with their legs and head. Remaining in this position can be deadly for the horse.

To rescue a horse that is cast in a stall, the handler should call for assistance while also appearing calm to the horse. The handler should talk to the horse to be sure the horse knows of the handler's presence. As soon as an assistant is present, the handler should position himself near the lower part of the horse's neck while not getting near the horse's legs or trying to step or reach over the horse. The safest method of moving the horse is to place a rope loop around its neck, work the loop toward the upper part of the horse's neck, and then pull the neck away from the wall and toward the middle of the stall until the horse can get its legs underneath its body. In the absence of a rope, the mane in the mid-neck area can be pulled to move the horse. Pulling the horse by a halter and lead rope to reposition a cast horse could injure its neck. Care must be taken by the handler not to get stepped on or pinned against the wall by the horse as it attempts to stand. The horse should be observed for an hour after standing for signs of colic that could result from being cast or swellings in the legs from injuries that may have occurred.

Alternative methods that involve pulling on the horse's legs and rolling the horse toward the handler are not recommended.

Head and Mouth Restraints

Cradles

Cradles are collars of parallel wooden rods tied with cord that can wrap around the horse's neck to prevent a horse from chewing its front legs and some of the rear parts of its body. A cradle can also be a deterrent to cribbing and prevents biting and tugging on blankets. Although it permits grazing, it must be removed for the horse to eat from an elevated feed bunk.

Side Sticks

Side sticks are a pole attached to the halter and a surcingle (strap around the chest) which prevents a horse from reaching back to chew any of the back part of its body, but it can reach the distal aspects of its front legs. Side sticks do not interfere with eating or drinking.

Grazing and Cribbing Muzzles

Grazing muzzles are used to prevent horses from eating bedding or too much lush grass or from choking on food pellets. Muzzles can allow overweight horses to get pasture exercise and socialization with other horses while being on a restricted diet. A grazing muzzle should be light weight, provide for air circulation, fit well, and have a breakaway safety mechanism for release if it is caught on a fence or other stationary objects. They have mesh openings that allow very limited amounts of grass to be grazed.

The fit should allow one inch from the bottom of the muzzle to the lips and 3 to 4 fingers width on the side of the muzzle. A grazing muzzle should be removed for an hour twice per day to ensure that the horse drinks and can lick salt. They can drink with it on but some horses will not.

The initial cause of cribbing is controversial, but regardless of the inciting cause, it is aggravated by boredom. When a horse cribs, it grabs a stationary horizontal object with its incisors usually immediately after eating grain, flexes its neck, and leans back while grunting and sucks air into its throat.

Grazing muzzles may also prevent cribbing. Some stables attempt to eliminate all horizontal objects that horses could crib on. Surgery to prevent cribbing is no longer recommended.

A common problem with the efficacy of grazing and cribbing muzzles is intermittent use. To be effective, they must be used every time the horse has access to grass or to a horizontal object that it can crib on, respectively.

Cribbing Collar

An alternative means to a muzzle for controlling cribbing is a cribbing collar. A collar can be used that goes around the ears and throat causes discomfort when the horse pulls down and back with its mouth. Some collars emit a low voltage electric shock when the horse cribs. There is debate as to whether horses should be physically prohibited from cribbing since this is blocking an emotional, perhaps physiological need to crib and physical restraint may make the need to crib worse. Since there is risk of a horse in a pasture getting the collar caught on fencing or other objects, at least one attachment should be breakaway. If something startles the horse and it raises its head too high, the strap on some collars can press on the trachea and carotid arteries causing the horse to stagger or faint.

Horses that crib should be on pasture with other horses for distraction and confined with electric fencing that they cannot crib on as much as possible.

Bib

An equine bib is a leather flap that attaches to a halter. Its purpose is to prevent chewing of wounds or blankets. It must be removed to allow the horse to eat. Drinking is possible with the bib in place, but the horse may not attempt it and must be monitored for attempts to drink.

Neck Straps

Neck straps are similar to dog collars and are fitted to be worn on the upper neck. The strap's purposes are for identification and minimal restraint. A horse should not be led by holding onto a neck strap. Straps should be breakaway for the safety of the horse at turnout and the safety of the handler who tries to use the strap for more than minimal restraint. Neck straps are less prone to being caught by bolts, limbs, etc. than halters on pastured horses. They are primarily used to

identify individual broodmares.

Now let's recap the key points to remember from today's episode:

- 1. Winter blankets are not necessary for healthy, unclipped, adult horses with adequate shelter for temperatures down to 0 degree fahrenheit.**
- 2. Backing a horse into a corner of a box stall is a readily available, effective means of restraint.**
- 3. Horses should be led into stocks by the handler on the lead confidently walking through the stock ahead of the horse.**
- 4. A horse cast in a stall requires immediate assistance to regain the ability to stand.**
- 5. Cradles, side sticks, or bibs can prevent chewing on blankets or wounds.**

Abby says it is time to wrap up this episode.

More information on animal handling is available in my book, *Animal Handling and Physical Restraint*, published by CRC Press. It is also available on Amazon and from many other fine book supply sources.

Additional information is available at: www.betteranimalhandling.com

Don't forget, serious injury or death can result from handling and restraining some animals. Safe and effective handling and restraint requires experience and continual practice. Acquisition of the needed skills should be under the supervision of an experienced animal handler.