Winter Care for Horses

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As days get shorter and the weather becomes cold and wet, there are many things to consider in order to maintain horse health and well-being throughout the long winter months. This fact sheet addresses the most common concerns regarding equine housing, health maintenance, nutrition and exercise in cold weather.

Housing and Shelter
One needs to look at their individual circumstances during the winter months to figure out what is best for their horse. For example, even in the harshest winter, most horses do not need to be stabled in a barn if there is shelter from the elements in the form of a run in shed or even a dense stand of trees. However, most horses that are kept outside with little or no shelter will grow a longer hair coat (page 1, left). This longer, denser hair coat will help keep them warm and prevent heat loss, but it limits their ability to effectively cool out quickly after exercise. Some solutions may include clipping the long hair and blanketing the horse. When they are turned out in cold, windy and/or wet weather horses need to be monitored carefully for shivering (whether blanketed or not). A horse’s respiratory health during the winter can be a concern if housed indoors with limited ventilation. Ventilation should be maximized by keeping windows/doors open as much as possible, even in very cold weather. Ceiling fans/vents also facilitate adequate air exchange. Wet bedding and manure should be completely removed at least once a day.

Blanketing and Clipping
It is not necessary to blanket a horse in winter as long as it has a naturally thick hair coat and is adapted to the cold. There are a wide variety of blankets available, ranging from lightweight “sheets” that are best suited for short term use after riding, to thick, waterproof “rugs” designed for long term use with horses turned out for extended periods of time. It is important to select a blanket that is appropriate for the specific conditions the horse is facing. If the horse is outside in wet weather, it is important that the blanket be at least water repellent and lined with material that will wick moisture away from the horse’s skin. A wet horse that has been blanketed will be colder than an unblanketed horse with a thick hair coat that can naturally dry out. Blanketed horses should also be monitored daily by either removing the blanket or checking with a bare hand to see if the weight of the blanket is causing the horse to sweat. If a horse sweats under the blanket, especially if its coat is dirty, it can contribute to skin irritation and infections.

It is equally important that blankets fit the horse. Many horses develop rubs or sores on the point of their shoulders, withers, and where the straps secure the blanket if it is too small or tight. If the horse is blanketed continuously it is imperative that the blanket be completely removed at least once a day. This can be done while the horse is being groomed; check for rub marks, infections and monitor for weight gain or loss. For more detailed information on blanketing, see Rutgers Cooperative Extension Fact Sheet “To Blanket or Not To Blanket” FS1081.
If horses are exercised regularly to the extent of generating sweat through the winter months, it is recommended to at least use a ‘trace clip’ (page 1, center), where the hair is shaved to about 1/8 inch length from the underside of the neck and abdomen, and the sides of the horse from the elbows to about a quarter of the way up the body. If the horse has a complete ‘body clip’, where all hair on the neck, legs and body is shaved, it should not be left out in inclement weather even if blanketed. Other clipping patterns commonly used include a ‘hunter clip’ where hair is shaved similar to a body clip but hair is left in the saddle area and on the legs. The ‘blanket clip’ is where hair is shaved from the neck and body similar to a body clip but hair is only left on the legs. Body clipped horses may have higher energy needs than an unclipped horses due to their increased exercise regime and excess heat loss. Be aware that the hair will not grow back rapidly in the winter, so once horses are clipped, they must have the appropriate shelter and blankets for the rest of the winter and into the early spring months.

Nutrition

Major nutritional concerns during the winter months include providing adequate calories to maintain good body condition and enough water intake to prevent impaction colic. To monitor body condition score in unclipped horses in the winter it is essential that they are physically touched in order to get a true assessment. In the winter, horses often need extra energy to keep warm. Horses’ energy requirements may increase up to 25% during winter months. Usually this need can be met by feeding approximately 25% more hay if their hay intake is normally less than they would eat voluntarily (1.5 to 2.0% of their body weight. The extra hay generates additional warmth to the horse through the heat produced in the hindgut (ecum and colon) when digesting/fermenting the forage. Boredom can also be a significant factor in winter when horses are not turned out or exercised as much, so keeping them content with free access to hay or forage based feeds, salt and water will reduce the incidence of stress-related problems and vices.

If horses are consuming overly mature or low quality hay, the vitamin and perhaps mineral content may be inadequate. Supplementing a lower quality hay ration with a multi-vitamin/mineral supplement specifically formulated for the individual horse’s stage of life (growing, mature, lactating, etc.) and type of hay (grasses vs. legumes like alfalfa or clover) is a good idea at any time of year. Be careful if considering special “winter supplements.” Be aware that most of these are standard multi-vitamin/mineral supplements, but cost more just because they have a special name. Any multi-vitamin/mineral balanced for the type of hay being fed and the life stage of the horse would be sufficient.

Horses limit their intake of ice-cold water to only what is absolutely necessary to satisfy thirst, which may not be adequate to maintain optimal hydration. It is important that horses are given access to an unlimited amount of water (usually 10 gallons or more) that is free of ice at least once a day in sub-zero weather, especially if water is available only in buckets or tubs. If automatic, heated waterers are used, units should be checked daily to make sure they are functioning properly and have not become frozen or have electrical shorts that cause horses to receive shocks when drinking. A tablespoon or two of plain salt can be added to feed to encourage increased water intake and, if feeding pelleted feeds or hay cubes, they can be soaked in water to further increase water intake. Horses should always have free access to salt blocks.

Exercise

In harsh winter weather many horses are often stabled for days at a time. As long as they have unlimited access to hay, salt and water most are perfectly happy to remain in stalls. However, if horses develop lower leg edema (stocking up) or are agitated in the stall, efforts should be made to turn it out for exercise as often as possible (even if in an indoor arena) or at least hand walk. Exercising horses does not need to be stopped when the snow becomes deep, it can actually act as a form of resistance training. However, caution needs to be taken when riding in snow that is excessively heavy and damp, as it simulates riding in deep sand and could potentially cause tendon injuries. If the snow is light and less than a foot, doing trot sets or some lighter flat work can help with cardiovascular conditioning and hindend strength. It is advised that one know the area where they are riding well so not to step on snow covered holes or obstacles.

If riding a fully clipped horse in the extreme cold, it is recommended to use a quarter sheet (page 1, right) during warm up and cool down. However, horses with full coats or a trace clip do not need a quarter sheet when warming up; for cool down, depending on how sweaty the horse becomes, a quarter sheet might be necessary to help wick away the moisture. Even with clipped horses, it is not recommend continuing the entire workout with a blanket or sheet. Cooling down and drying out the hair coat is important. Leaving a hot, wet horse standing in a cold, drafty stall or turning it out in the cold could cause it to get chilled and potentially stressed to the point of getting sick.

In terms of shoeing requirements in the winter, some horses are left barefoot, especially if not ridden often. Horses have better traction on snow and ice with bare feet than with flat metal shoes and the snow will not accumulate in the bare hoof as it does in a shod hoof. If the horse needs to be shod and is going to be ridden or turned out in snow, it is advisable to use “snow pads,” in the form of a full hoof pad or a rim pad, which prevent snow from accumulating in the hoof. Caulks (studs that are either fixed or removable) or borium can be used to help with traction on frozen or possibly icy ground (ask your farrier about options possible). Sole bruising is a problem in the winter when working on uneven frozen ground, especially in horses with thin soles. If riding regularly in the winter without pads, keep workouts to unfrozen footing (or deeper snow) as much as possible. If arenas are frozen it may be best to postpone riding that day or week rather than risk injury to the horse.
Health

One health concern in the winter is protection against infectious diseases even though most horses get their routine vaccinations in the spring. Booster vaccinations for diseases that are transmitted by direct contact, such as influenza, rhinopneumonitis, and strangles are recommended if the horse is in a boarding stable with a lot of horse traffic. If new horses are brought in frequently or the horse is attending shows/competitions throughout the winter season, a more rigorous vaccination schedule may be needed. Mosquito borne diseases such as West Nile Virus should not be a problem in the colder climates but booster vaccines should be considered if shipping the horse to warmer climates for the winter.

Horses should only be de-wormed as needed, based on fecal analysis for the presence/absence of intestinal parasite larvae or eggs. Manure should be picked up on a daily basis in the paddocks and around areas where horses congregate outside to prevent unsanitary organic material accumulation that contributes to the development of parasite infestation, thrush and skin infections on the lower legs of horses. This is especially important when the temperature climbs above freezing and melts snow and ice, creating muddy conditions.

Another health consideration during the winter months could occur after heavy storms. Tree limbs that fall into paddocks/pastures could potentially be toxic and horses could chew on the branches out of curiosity or boredom. Also, in the spring, the first green plants to appear are usually noxious weeds, not the nutritious grasses, so it is important to feed plenty of hay and keep the weed population down by mowing and/or use of herbicides if necessary.

This fact sheet contains some considerations for winter care for various types of weather conditions and farm situations. It is recommended to first assess your farm’s situation and horse care needs before deciding what form of housing/shelter, blanketing or clipping schedule, exercise regime and health care measures are right for you and your horse.