Do you have the right driver’s license?
Eileen A. Coite, REINS Coordinating Agent

Having the right type of driver’s license and tags on your vehicles sounds simple enough, but is it? I often find that things are not always as easy as it would seem, and sometimes just as we think we know the laws, there is a change. I originally wrote this article a couple of years ago, but a few things have changed and I have heard that the state highway patrol have been more frequently stopping drivers hauling livestock and other agricultural commodities, so it might be a good time to review our driving rules for pulling livestock and horse trailers.

The bottom line on licenses to pull trailers is to know the weight of your trailer. Every trailer (and vehicle) has a gross vehicle weight rating (GVRW) listed on the body of the vehicle. Look for a small metal plate on the front end or side of your trailer which lists all specifications, including the GVRW. For regular passenger vehicles, a class C regular license will suffice. According to the DMV, a class C license allows you to “operate any combination of noncommercial motor vehicles that have a GVRW of more than 10,000 pounds and less than 26,001 pounds, as long as the driver is 18 years of age or older”. Furthermore, according to the DMV “most drivers need only a Regular C license to operate personal automobiles and small trucks.” So, if your horse or livestock trailer is rated with a GVRW which is less than 10,000 pounds, you are fine with a class C license. Most small livestock and horse trailers fall into this category, such as a two horse tag-a-long or even some aluminum goosenecks. If it’s over this weight, read on.

There are two other classes of “regular” licenses. These are a Class A and Class B. The only real difference between the two of these is (Continued on page 2)
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that the Class A is for any vehicle towing a vehicle of 10,000 pounds or more and the Class B is for a vehicle that weighs 26,001 pounds or more. Most truck/trailer combinations with a trailer over 10,000 pounds would require a Class A license, since small or passenger trucks weigh less than 26,001 pounds. If you have a large or long bodied horse or livestock trailer, you most likely will need a Class A license to haul. Occasionally, horse or livestock owners have been stopped and asked to see their license, and some have had to find drivers to get their rig back home! Don’t let this happen to you. Check your trailer now and make sure you are in compliance.

Another thing to consider is vehicle tags. In addition to having the correct license, most vehicles must have a weighted tag if hauling a trailer or carrying weight that goes over 7000 pounds. So, if you are hauling a livestock or horse trailer, you will need weighted tags, or possibly farm tags, and should weigh your loaded trailer to know how much weight you are pulling and how much to have registered for your tags. Farm tags are only offered if you can document that your vehicle is used for farming as your source of income. There is an official form with questions that must be submitted to qualify for farm tags. Finally, make sure to give your trailer a good overall inspection. Checking the brakes, the floor, and lights is critical. Especially if you are ever hauling after dark, all lights should be operational and I’ve been told that just one non-functional light could cause problems if you are stopped. In fact, if your trailer has a gross weight of over 4000 pounds it also needs a yearly state inspection, so that might be something else to check into.

Much of the information I have provided here can be viewed at the NC Division of Motor Vehicles website, at www.ncdot.org. Otherwise, contact the closest DMV office for questions you may have.

Mud Fever Any One?
Emily Herring, Extension Agent Pender County

Even though we’ve had plenty of dry weather so far this summer, wet conditions and areas can exist in low areas, around water troughs, etc. It’s important to be prepared for mud fever - often known as scratches if these conditions arise. Mud fever is more prevalent during springtime, but could be a problem year around giving that the conditions are right. The exact cause of scratches is not known, but tends to be correlated to poor stable hygiene and wet paddocks/pastures or muddy conditions.

Things to look for in your horse include, mud accumulating around the back of the pasterns, itchy, swollen, and sensitive pasterns. These are typical things to notice in the beginning, but if they are left unnoticed the hair will clump up and will fall off leaving soft skin exposed with ooze, grayish color, and accompanied with a foul smell. If untreated it can become a chronic condition that can cause horses to form nodules behind the pasterns that can harden…this is where a veterinarian should be called to treat the horse for scratches. When scratches are detected remove the horse from the wet conditions that caused them to form, and then remove the matted clumps from the areas affected. Soaking the mats in warm water will help them to come off easier with less pain for the horse. A phone call to a veterinarian should be made for medical advice on how to treat scratches. The veterinarian may prescribe antibiotics and/or ointments for the horse to be used after the area is clean from scabs and completely dried out. It has been recommended to also apply a moisture repellent product like baby oil after the area has been dried and ointment is applied. It’s important to not wrap or apply the moisture repellent to the affected area, this would cause moisture to build and cause the problem to become worse.

Scratches can be prevented with good stable hygiene, drying of heel and pasterns after exercising, clipping the long hair behind the pasterns, and spraying the back of the pasterns, with a half and half mixture of vinegar and baby oil after washing and drying. If you suspect your horse is suffering from scratches or mud fever, call your veterinarian for advice on how to treat your horse.
Back in the 5th grade my cousin Ralph used to entertain us by wiggling his ears. Nobody else could wiggle theirs and even though he wasn’t very good at it, he could usually get a few chuckles. As it turns out, humans only have three vestigial muscles controlling ear movement.

Horses, on the other hand, have 16 auricular muscles controlling their outer ears (pinna). We’ve all seen how quickly a horse can move its ears. With those muscles, horses can twist their ears in every direction. And they can do it quickly. We typically consider the horse uses its ear for three purposes: to hear, to communicate with other horses (and us), and to flick flies.

This article focuses on hearing. Unfortunately, research in the field has been limited and is often dated. We can, however, make some definitive statements about equine hearing that are important for every horse owner to understand.

We can divide hearing into three major functions: detection, localization, and identification. Let’s look at each in turn, recognizing that individuals within any species will vary greatly in their ability to hear.

Detection. Hearing depends primarily upon two factors of the sound wave: its intensity (how loud it is) and its frequency (or pitch). As a general rule, the louder a sound is, the more easily it’s detected, even if it’s in a frequency range where the ear’s abilities are degraded. Quieter sounds may only be detected in the mid-range frequencies where the ear naturally functions the best.

Because of the nature of sound waves, animals with less distance between their ears can usually detect higher frequency signals. The average adult human sports about 11.8 inches from one ear canal to the other. The average riding horse has about 6.9 inches. As a consequence, horses have greater sensitivity to higher pitches than humans, and are less sensitive to lower pitch sounds.

The average healthy young human can hear sounds as high as 18 to 20 kilohertz; horses can range as high as 35 kilohertz; dogs may hear at 44 kilohertz; and cats have been known to hear as high as 79 kilohertz. At the low end, a horse can typically hear a moderately loud sound as low as 55 hertz.

The shape of the horse’s ear helps gather sound, acting as a basic amplifier. In other words, you might expect your horse to hear quieter noises at any given frequency than you can hear. His ears are better optimized for that than yours are.

Localization. Horses localize sounds very poorly. Typically, mammals localize in two ways. Sounds coming from any direction except straight ahead or straight behind will arrive at each ear at different times. The brain computes the time difference of arrival and arrives at an approximate direction the sound came from. A second technique uses the fact that the head will mask the sound wave so the ear away from the sound source will hear it at a slightly reduced volume. This difference in intensity levels also serves to help mammals locate the direction of the sound source.

Which gets us back to the ear distance again. The greater the distance between ears, the greater the ability to localize. Once again, you have an advantage over your horse. Even though he can swivel his ears quite rapidly, he can’t pinpoint the sound with the precision that you (the ultimate predator) can do.

To compensate, the horse immediately brings its eyes into play. You can usually tell where a horse is looking by observing its ears. The ears detect and provide a general direction for the sound source; the eyes provide the confirmation. This arrangement makes sense when you remember that a prey animal does not have to localize sounds with the same precision as a predator. A cat has to localize a mouse with great accuracy. A horse only has to know which direction to run away from.

As a footnote, if a horse can hear something that he can’t see, he can become quite agitated. He’ll start finding predators hidden in every rustling bush. That’s when he has to depend upon his partner (you) to keep him safe from harm. Otherwise, he’s leaving. And fast.

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Humans do the same thing. If you recognize a non-threatening sound you rarely trouble yourself with further identification. If, on the other hand, you hear a sudden noise in the night, you go on high alert and bring all your senses to bear until you figure it out. Most likely it was just the cat jumping off the table, but you have to assume the worst until you know for sure.

Your horse reacts the same way.

**Identification.** At the crudest level, the horse most cares whether the sound source is a predator or not. That’s the first decision it must make for survival. A prey animal’s instinct is to assume the worst.

In dealing with an unknown sound source, a horse most likely depends heavily upon both its eyes and ears for identification.

Horses are designed to be grazing animals and roughages are important for their health and maintenance. Left on their own, horses will graze most of the day, if forage is available. Domestication has imposed limits on this natural instinct. How you stable your horse and his use determines how you feed him. A show horse has higher protein needs than your average trail horse. It also changes the amount of hay that is used.

There are two ways to feed hay to a horse in a stall, in a hay rack or on the floor. Hay racks work well keeping the hay out of the bedding and cutting down on waste. Throwing it on the floor works with some horses, the ones that don’t stir up their bedding and soil the hay. Eating off the floor mimics grazing and some horses will pull hay out of the rack just to eat it off the floor. As long as the stall is clean and the floor isn’t dirt, either method works well. Giving a stall bound horse something to do also cuts down on boredom, which is a main cause of stable vices.

On the other end of the horse keeping spectrum is the horse with a run-in shed that stays turned out all of the time. Pasture is the most natural way to get fiber in a horse, but in the winter supplementing hay may be needed if you don’t plant cold weather grasses. If the only turnout you have is a paddock or dry lot, then hay is needed. After buying hay, you need to determine the best method of hay delivery for your horse’s current situation. Throwing the hay on bare ground will cause the horse to pick up sand when he eats, increasing the chances of colic. Safe, large buckets or rubber tubs can work keeping the hay off the ground as long as the horse keeps his feet out and doesn’t paw it out. You can hang a hay rack if there is a wall available close enough to throw hay in.

We have been talking about hay in square bale form. Round bales have been a staple in the cattle industry and has been gaining in popularity with the horse crowd. We have been feeding our trail riding mules round bales for years, and it has worked out well for us, they’re happy and we work less.

There is a lot of waste if a bale is just placed out in the paddock. To get the most hay use for your money, invest in a hay ring. There are several nice horse friendly ones made. A cattle hay ring will just rub the horse’s mane out, they have to put their head in it, not over it. We have not had any problems with the hay getting wet or sun bleached, fiber is fiber. However, its important to remember to store the round bale on its side - strings facing up - so rain will roll off and not saturate the bale. Once they get used to it, they tend to eat like they graze, on and off, not all the time, like they would graze in the wild. We live in a very sandy area, and have had problems in the past with “sand colic”, since changing to free choice round bales, we have eliminated that type of colic. I’m not saying that it will eliminate all colic, just get their digestive tracts working in a more natural manner.

Think about your hay delivery system when you go to buy your next load of hay. Consider buying a combination of square bales and round. We have a show horse that stays part-time in a stall, and mules that stay on a dry lot. By getting them the right amount of hay, I feel like it has cut down on our vet bills and the animals are being fed in a more natural way. They work hard for us, but we don’t need to work hard getting them the roughages they need to stay healthy and happy. Work smarter, not harder, and we’ll see you on the trail!
As we enter hurricane season everyone needs to have emergency plans in place for their farms. As many of us saw, the tornados in April showed us that having emergency plans in place could be critical.

Every farm operation is different and has different needs. How large of a farm operation do you have? Whether it be large or small power is a main thought that comes to mind first. Flooding and accessibility to the farm is another concern. Here in Eastern N.C. we are not totally out of danger of hurricanes, we saw that with the damage from hurricanes Fran and Floyd.

It all starts with the farm plans and the building site. Selecting a site that is on high dry ground is critical. Then the building you construct should be able to withstand high winds that are common for the area. You also want to keep in mind the summer months, heat, sun and thunder storms. Be sure to check with your local County office on building codes. There may be special requirements for your area such as hurricane straps (which is a good idea in any area).

Hurricanes can spawn tornados. They can cause extensive damage from heavy rainfall. Flash flooding may occur due to intense rainfall and flooding of river and streams may persist for several days after the hurricane has passed.

Are you ready? Here are some tips to help you prepare

- Ensure all animals have some form of identification (ear tags, brands, paint markings, clipped initials in hair, etc.)
- Evacuate animals if needed; map out routes with an alternate route in case primary route is blocked
- If evacuation is not possible or necessary, the decision must be made whether to house or pasture the animals and this depends on the soundness of the structure.
- Monitor weather for up to date reports
- Secure items that might blow away and store outdoor equipment
- Keep list of important numbers handy
- Coordinate with neighbors
- Move feed to higher ground if needed
- Fill bathtub, washer and other large containers with water to ensure water for personal needs.
- Turn off all gas supplies

When should you evacuate?

- If you are directed by local authorities to evacuate.
- If you live in a mobile home or temporary structure
- If you live in a flood plane
- If you feel in danger
- All evacuations should be completed before the first of the rains and winds arrive.

Stay indoors, after the storm has passed your first concern should be your family. then the animals and farm. Be aware of gas leaks, downed power lines, contaminated water, washed out roads and chemical spills. Watch for snakes and wild animals. Use caution with farm animals. They may be frighten and not react as they normally do. Report leaks, spills, and dead animals to the proper authorities. Now is the time to start preparing, not when a hurricane is predicted to strike. Being prepared can mean the difference between minor damage and total loss. You can go to the FEMA web site at http://www.fema.gov/hazard/hurricane/index.shtm for more information and how to prepare a hurricane evacuation kit.
### REINS Volunteers by County

(Volunteers may be contacted via Extension Agents)

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- Will Walls
- Roger Davis

#### Wayne County:
- Lynn Lepley
- Vivian Rowe
- Cindy Wheaton
- Vickie Yelverton

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**Hoof Prints** is a quarterly newsletter written by a team of experienced and certified equine professionals for persons interested in equine information in Southeastern North Carolina. For more information on material and events presented in this newsletter, contact your local agent and Cooperative Extension office at:

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**Kids Corner... By the Numbers**

Fill in the blanks with the correct number

Answers on Page 5

- **gallop** = ____ beats
- **pen** = ____ by ___ feet
- **hand** = ____ inches
- **a healthy horse** = ____ to ____ degrees F
- **event** = ____ riding disciplines
- **walk** = ____ beats
- **draft horse** = ____ to ____ pounds
- **lead rope** = ____ to ____ feet
- **canter** = ____ beats
- **box stall** = ____ by ____ feet
- **pony** = ____ or less hands
- **trot** = ____ beats

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**We’re on the Web!**

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