

Preparing your horse for the (crazy-fun) sport of endurance riding

by Jeanette (Jay) Mero, DVM

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So how do you get an equine ready for the unique challenges of long-distance riding? Well, as many of my old mentors back on the East Coast used to say, “There is good news and bad news: the good news is you get to ride your horse, a lot. The bad news is you have to ride your horse, even when you do not want to.”

I still clearly remember being introduced to the sport when I was an intern at the Ontario Veterinary College’s Large Animal Hospital in Guelph, Canada, in 1994. I had a little Morgan stallion at the time, and like many of you I had grown bitter and irritated with the unfairness of the show horse world. On paper, endurance riding seemed like the perfect sport for me, fulfilling my competitive nature, with my success completely my own responsibility.

However, as I embarked on the endless miles and hours of trotting that first year, with all those sore and screaming naïve muscles and chronic blisters, I still somewhat fondly remember saying, “What was I thinking? Do I really think that I’m going to trot for 50 miles?!”

I’m sure many of you have a smile on your face right now, thinking back to your own first years of conditioning. Thank goodness for muscle memory; that makes it possible to build on past riding, and we don’t have to start over every season. Now after years and years of heavy riding, even if I have large gaps of time off from conditioning and competing, I don’t have the same pain as I did that first year. The body develops long-term strength and hardening (resilience) borne of many years of being in the saddle.

The same holds true for our equine companions, although they are a bit luckier in that the horse as a species is a natural-born athlete. This natural talent of the horse often leads to problems, however, as over-ambitious riders or owners think their horse is ready to compete when in fact the horse is not.

The horse easily develops cardiovascular fitness at a rapid rate, far faster than humans, giving a naïve or over-confident rider a false sense of security. Unfortunately, while the horse’s heart, lungs and muscles may be saying “go,” the tendons, ligaments and bones are all saying “*Whoa*—slow down.”

So how do you develop a fit, strong, well-conditioned, hardened horse—ready to withstand the rigors of our sport for many years to come? The answer: with a patient, steady, slowly progressive training and conditioning program.

Progressive loading conditioning

The concept of “progressive loading conditioning” is not unique to the sport of endurance riding, but is one of the base physiologic tenets for building or improving fitness in all biologic systems. Physiologically, for a response in a system to occur, such as improved fitness in a horse (or any mammal for that matter), the horse must be subjected to a gradually increasing exercise load, which leads to athletic conditioning. Increases in this physiologic response (improved fitness) can only occur by subjecting the horse to increasing loads, or increased specific exercise.

It is important that one’s conditioning program be specific to the sport; i.e., in endurance competitions, one must condition specific body systems to accomplish long-distance travel at a competitive rate of speed. That’s why we emphasize building up the capacity to trot over increasing distances in our horses (and ourselves).

To avoid overloading the system and/or injury to the horse, an increased load (or increased level of conditioning) should not be applied to a horse until the horse has adapted to the previous level of stress or load. Knowing how much to add takes knowledge of the horse and experience by the rider—and that is why being conservative is always a good rule. The cost in time and care of rehabilitation of an injured horse is a painful way to learn one has been too aggressive in their conditioning program.

Principles of conditioning

There are several principles of conditioning, or applying stress, regardless of the species:

Adaptations, or improvements in fitness, occur during the rest periods. Hence the common recommendation to not work an endurance horse hard every day.

Individuals respond differently. Every horse will handle training and conditioning differently and allowances must be made for each animal and its unique make up.

All adaptations are reversible. Luckily for the horse, as opposed to humans, detraining—or loss of fitness that occurs with periods of rest, forced or otherwise—happens at a much slower rate in horses than in humans. In most cases, detraining losses can be measured in days in humans, as opposed to weeks in horses.

Skeletal muscle fibers will adapt to the stresses or forces applied to them. For example, long slow dis-

tance will evoke a different set of muscle responses vs. sprint training or even weightlifting-type training.

Overtraining is a very real and very bad thing, leading to injuries, staleness, depression, and even ulcers. “If some is good, more is better” is not a phrase to be used in athletic conditioning.

The adaptations, or improvements in fitness, occur in five major systems:

- cardiovascular
- metabolic machinery
- supporting structures
- temperature regulating systems
- central nervous system, or coordination system.

The horses’ cardiovascular system is remarkable in that changes occur rapidly with training. Within just two to three weeks improvements are noted such as lower working heart rates during exercise and more rapid heart rate recoveries. Within weeks to a few months the horse’s ability to mobilize fat and energy more efficiently during long-term exercise demands improves. During that same time frame the horse’s ability to cool itself enhances, with increased capillary beds developing near the skin surface, and more efficient sweating patterns.

In a just a few months improved muscular development can be noted, but it can take up to one to three years for the horse’s ligaments, tendons and bones to fully harden and adapt completely to the demands of distance competition. It can likewise also take months to years for a horse to fully develop the coordination, balance and suppleness needed to safely and adroitly travel over extreme terrain.

Starting a new distance equine

How do you start conditioning an endurance horse? With a long-term outlook in mind. Think years, and think slow and steady.

Long slow distance, or LSD, is the basis on which the entire foundation of your horse’s future career and longevity is built. This is a good time to enhance the horse’s training—getting them to know and like the sport.

Slow and cautious progress, paying particular attention to detail, using the progressive loading theory, is best—it helps if you keep a training log to follow and map your horse’s progress. Going too fast too soon, both in work distance and speed in conditioning, can not only hurt your horse in the short-term, but could potentially end

Conditioning the green or unfit horse

FIRST: 1 TO 2 MONTHS

Ride 3-5 days a week, walking rides of 3-5 miles. After several weeks add in short trots of 5-15 minutes—get them accustomed to the trail and all the spooky things that are out there.

SECOND: 2 TO 4 MONTHS

Reduce work outs to 3-4 days a week, with additional days of schooling, working on flexion, suppleness, responsiveness and “trainability.”

Steadily increase the trotting times, but keep the speed conservative at 5-7 mph. Weekly increase the mileage up to 10 miles per ride. Check heart rates post-ride, target of less than 60 bpm in 10-20 minutes.

Check legs daily for pain, heat, swelling; if so noted, then allow adequate rest and recovery and go back in conditioning steps until the issue has fully resolved and does not occur again.

THIRD: 4 TO 6 MONTHS

Start increasing once a week, to once every 2 weeks a longer ride. Gradually add in 2 miles per every long ride, working up to 25 miles. Keep the other 2-3 days a week at 8-12 miles, or 4-5 short rides and one long ride in a 2-week cycle.

Keep the average speed at no more than 6-8 mph.

Work up to trotting 2/3 to 3/4 of the total distance. Continue monitoring progressive heart rate recovery and limbs for any issues.

up destroying your horse’s lifetime career in the sport.

Many a horse has been ruined in its first year or two of conditioning and competition; for example, by causing a severe tendon or ligament injury, from an owner/rider going faster than their horse’s body has been fully adapted to. Riders—even older, experienced riders—sometimes get caught up in the excitement of competing a really talented, game horse that metabolically can and wants to go at speed, up front in the top ten. But without having paid the dues of years of tendon and ligament hardening and conditioning, they will only to feel the pain and anguish later when their mount is pulled for a lameness that too often is a severe suspensory ligament injury.

You should not have any aspirations of going at speed and racing in your first year of conditioning and competition with your horse.

The nuts and bolts of any particular endurance training program can and do vary based on age and experience of the horse that is to be started, and the terrain one has to train on. There are many different types of endurance training programs, most of which have value and a place in preparing a horse for an endurance career. There is no one “right” way or the “only” way to prep a horse for endurance—remember horses come with different breeding, talent and background, and each requires its own conditioning program. However, with all of them, one should

stick to the basic tenets of progressive loading training.

Sample conditioning programs

The following suggestions are just some of the tried-and-true successful programs many riders have historically used in our sport. For certain there is no exact “cook-book method” that will work on every horse, every time. Remember each horse is an individual and each owner/rider will need to be sensitive and flexible in applying the best methods and steps needed to prepare their particular horse for this demanding sport.

In addition, a reasonably fit horse, or a horse that competed the previous season and only needs to be brought back up in fitness again, will not need to undergo as much of a cautious program as a completely green young horse.

Limited distance riders can also reduce the mileage needed to prepare for the shorter distances.

This pattern of several short rides, with one long ride per week to two weeks, will be the backbone of your horse’s conditioning program for life. (*See chart on previous page.*) Do not forget to allow time on the off days for schooling with arena exercises to encourage proper carriage and responsiveness. Check your horse daily for any limb swellings or changes, decrease or lack of appetite, poor attitude, or dullness—these are all signs of overtraining and warrant a rest and recovery period before returning back to work.

Your first ride and beyond

If after four to six months of steady, careful, progressive conditioning, your horse is handling the weekly

long rides with no problems at all and is still energetic and happy afterwards, you and your horse are ready for a conservative 50 miler. If your horse handles that first 50 miles well, with a bright eye, perky, sound and lots of gas left in the tank—pat yourself on the back for a job very well done.

Allow your horse a little down time to recover—one to two weeks, and then get back to work again, continuing the building process of preparing your horse for a lifetime career in endurance.

You should not have any aspirations of going at speed and racing in your first year of conditioning and competition with your horse. Spend the time in your first one to two years putting in those miles, both at home conditioning and at rides, to allow your horse the time it needs to strengthen and adapt to the rigors of distance competition. Some conservative racing in 50 milers in your second year, and perhaps a modest 100 miler or two, are not unreasonable in your horse’s second season.

Speed play and interval training are also useful tools to begin employing in your second year of conditioning, along with a modest increase in working speeds.

If you have done your homework well, and paid your dues with nearly uncountable hours in the saddle with your horse—when your horse has finished its third year of conditioning and competition, it is generally thought of as a seasoned, fully hardened endurance horse. By the end of that third season your horse is considered ready to be raced at the longest distances, or competed in the toughest multi-days, with hopefully many, many more years of healthy competition to go!



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P.O. Box 6027 • Auburn, CA 95604 • 866-271-2372 • AERC.org • office@aerc.org