

text by: Cindy Reich I photo credit: Reindert Jansen

Is your stallion ready for the upcoming breeding season? While a lot of attention has been focused on mares and foaling since January, with the beginning of the breeding season, there is much to be done with stallions as well. Ideally you have done many of these duties already. If not, its time to get started!

How is the quality of your stallion's semen? Have you done a breeding soundness evaluation?

All stallions should have a breeding soundness examination prior to the beginning of the breeding season. It is important to know what the quality of your "product" is before you begin to use it! Even if your stallion got all of his mares or the majority of his mares pregnant in the previous season, biology is dynamic and constantly changing. Many factors can affect sperm quality and if you don't have your stallion evaluated, you might not know something is wrong until mares start coming up empty halfway through the breeding season. By that time it is rather late to be trying to figure out what is going on.

Ideally, the stallion should have semen collected twice, one hour apart and the semen evaluated by a trained reproductive specialist. The sperm should be evaluated for their structure (morphology) their motion (motility) and the concentration of sperm cells in the sample. This





information will be used to determine how many mares could be bred from a single ejaculate. By collecting the stallion twice, one hour apart, it is useful to determine whether the stallion ejaculated completely and to compare the ejaculates. If a stallion ejaculated completely on the first collection, the second collection should have approximately half of the concentration as the first ejaculate. Furthermore, as stallions store sperm in the epididymis (a long, coiled tube within the testicle), the first ejaculation may only be stored sperm cells, which may not be as normal in structure and motility as nonstored sperm cells. Therefore, if the morphology and motility is not the best on the first collection, but has improved on the second collection, it is a pretty good bet that the stallion's sperm quality will improve on repeated collections. If the quality remains the same or goes down on the second collection, it indicates that further work

should be done to establish the true quality of the stallion's reproductive status.

To really know what the quality of the stallion's sperm is, he should be collected daily for at least seven to ten days, to get to his daily sperm output (DSO). What you collect at this point is what the stallion is producing on a daily basis and does not include any stored spermatozoa.

In addition to the semen evaluation, the stallion's semen should be cultured for bacteria and pathogens. His urethra and prepuce should be cultured as well. There are many diseases that are sexually transmitted between stallions and mares and vice-versa and you want to know the status of your stallion before the breeding season starts. This is a common sense safeguard for both your stallion and the mares he is breeding. Furthermore, if















you plan to ship semen on your stallion or freeze semen, the use of antibiotics in the extender does not protect against all diseases.

GENERAL HEALTH

The stallion's general health should be evaluated and he should be up to date on all vaccinations and deworming well in advance of the breeding season. Some stallions can have adverse reactions to vaccines or dewormers and you don't want to do anything to the stallion that could affect his sperm quality during the breeding season. If you vaccinate your stallion against Equine Viral Arteritis (EVA) in order to export semen, it is critical to document the vaccination, as his blood will test positive for EVA once he is vaccinated (he will not infect mares) and if the vaccination isn't documented, the semen will be rejected.

If the stallion tends to fret in the breeding season, he should be slightly fat going into the breeding season. However, you don't want a highly overweight stallion for the breeding season, as it puts more stress on his heart and on his joints. Regular exercise keeps the stallion in peak performance as well has having a beneficial effect on his mental status. Riding stallions is an excellent way to keep them in condition, and the act of riding a stallion is also a subtle submissive relationship between the stallion and the human, which can be important with stallions that are very dominant.

Be careful of what supplements you feed your stallion. There are many out there that purport to increase sperm quality and motility. While the advertising may sound wonderful, you may actually cause some harm by feeding some supplements. Most people over-feed supplements











without understanding the interactions that can occur between multiple products.

Mentally, stallions are herd animals and should be able to see other horses. Keeping them in stalls or isolating them from other horses is mentally damaging to stallions. However, some stallions do not do well in close proximity to other stallions. In fact, research has shown that stallions that are kept in stallion-only barns, a common practice on Thoroughbred farms, actually reduces the fertility of all but the dominant stallion. Also, stallions are highly dominant by nature, and can become worse in the breeding season with other stallions in close proximity. Therefore having the stallion where he can see mares, foals and geldings is preferable.

Routine is important to all creatures—horses and humans both. Keeping the stallion to a routine will keep his mind easy and he will know what to expect. Try to do the breeding at roughly the same time(s). Make it clear to the stallion when breeding behavior is acceptable and when it is not. But be fair. It is not fair to ask a stallion to go to a show and be punished for looking at mares and then be asked to breed a mare when he gets home from the show. Ideally you should have different tack for breeding so that the stallion understands that when the breeding tack goes on, its time to breed but any other tack is for work, not breeding.

Taking the time to have your stallion prepared for the breeding season in advance will save time and trouble for both you and your stallion.