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From Intern to Associate: Meet Palm Beach Equine Clinic's Newest Addition, Dr. Samantha Miles by Lauren Fisher, Jump Media



Dr. Samantha Miles is a 2015 graduate of the college of veterinary medicine at The University of Edinburgh in Scotland. Upon completing her Doctorate of Veterinary Medicine, Dr. Miles began with Palm Beach Equine Clinic in September of 2015. Dr. Miles recently concluded the intensive internship program at PBEC, and has officially been hired as a full-time associate to join the team of exceptional doctors this year in Wellington, FL. Read on to learn more about Dr. Samantha Miles.

What is your background with horses?

I was born in Toronto, Ontario, Canada and raised in Kansas. My dad grew up in Winnipeg, Manitoba, and would take me to a little racetrack up there on vacations. This is where I fell in love with horses. I did not ride or show when I was younger, but I used to try to convince my parents to get me a pony. I rode a little bit when I was in school. I did some trail riding and worked for lessons and learned to jump a bit, but I never competed.

When and why did you decide to become a vet?

I always wanted to become a veterinarian. I

always loved animals, specifically horses, even though I had limited exposure when I was a kid. When I was sixteen, my mom told me that if I was serious about becoming a vet, I needed to know if I could handle the job. I got a job at a small animal clinic as a kennel worker and worked my way up to vet assistant. I continued working there in the summers through college as well. I did my undergraduate at Kansas State University studying Animal Sciences. At that point I was involved in summer internships and working on horse farms. I applied to vet school and was accepted to the University of Edinburgh in Scotland.

What was it like going to school in Scotland? Did you get different experience there?

It was pretty amazing. It was a lot different from anything in the U.S. in the sense that we had different requirements and the exams are set up very differently. We had to do a lambing season, for example, where we actually had to go out to a farm in the dead of winter and spend three weeks assisting lambs to be born. Going to school there also gave me the opportunity to travel and see what veterinary medicine is like in different parts of the world. I was able to complete externships in several interesting places all over Europe. My school was very supportive in providing us the opportunity to have those experiences.

How did you end up interning at Palm Beach Equine?

I graduated in July of 2015 and I started a position in Texas. I was transferred to PBEC to learn high-end sports medicine during the busy winter season in Florida, and I just ended up staying to complete an entire internship. I first came to Palm Beach in late September in 2015, and I just officially completed my internship and

moved to Florida permanently to start as an associate full-time.

What was the experience like as an intern at PBEC?

It has been amazing! I was an ambulatory practitioner in Texas immediately after graduation, but when I was transferred to PBEC it was amazing because the varied case load is so great, both ambulatory and hospital cases. I was able to learn a great deal and be hands on. The level of care at PBEC is just extraordinary. The number of cases they care for and the dedication they show to every animal is unmatched. I feel very lucky to have learned so much in a very short period of time.

I really like how the interns rotated throughout the program between hospital shifts and ambulatory shifts. The hospital shifts can be really taxing with long days and longer nights, but that is when you get to learn the best case management from start to finish. We would rotate through ambulatory, where I improved my interpretation of radiographs, and was able to schedule my own appointments. We were able to rotate spending time with different clinicians and learn from each of them. It is uncommon in many internships, especially in the U.S., where you get not only the hospital experience, but also ambulatory experience. In January, the program allows us on primary on-call after hours responsibility and we had a ton of direct support from all veterinarians. The doctors were always available to oversee the case with us or take our calls in the middle of the night to discuss a case. Having that primary case responsibility in tandem with another senior veterinarian was excellent experience.

Was there any particular case that was really interesting or educational for you?

One that sticks out in my mind was a nine or ten-year-old horse that had an intussusception, where part of its cecum telescoped into itself, which telescoped into its large colon. It was a really cool case and it was one of the first cases where the clinician really gave me free rein. It was a challenging case that ended up being really unique because it is typically found in very young horses, usually foals. It is rare to be diagnosed in horses older than six months.

I will always remember that case because it was the first time I felt really trusted by this particular clinician to work on her case. I was able to problem solve and utilize my skills. Just a couple of weeks ago, I was managing a case for a three-day old foal admitted into the hospital with the same condition. Because of that first case, I was able to manage it effectively.

Do you have any plans for a specialty?

Not at the moment, but I am very excited to be working closely with one of the partners, Dr. Richard Wheeler, and his focus is mainly lameness. I have a large interest in diagnostic imaging; lameness and imaging typically go hand in hand. It is my absolute favorite thing about veterinary medicine. Dr. Wheeler manages many diagnostic imaging cases, so I am excited to learn from him.

PBEC also has a board-certified radiologist onsite during our busy season, Dr. Sarah Puchalski, who I was able to work with during my internship. During the intern program, we have radiology rounds each week where we review interesting imaging cases anonymously to learn.



Dr. Puchalski has taught me a lot this past year and I am definitely looking forward to working and learning from her more in the upcoming years.

What other hobbies or interests do you have?

I really love to travel. That is my number one favorite thing to do outside of work whenever time allows for it. I love to explore new places. I really like hiking, although I usually only have time while traveling. I also love reading.

If you were not a vet, what would you be doing?

I would probably be a travel writer.



What are you looking forward to most about officially joining the team at PBEC?

I am really looking forward to using and always improving my skills. An intern with PBEC is exposed to many cases and learns a lot during the year-long program, but there are many skills that time and experience will improve. I look forward to really enhancing my skills and knowledge base as an associate, especially out in the field. I am also very excited to work with the vast support network available with Palm Beach Equine Clinic. As a new graduate out of school, it is comforting to know that assistance and advice from a mentor is readily available in all fields. I plan to learn everything I can from all the specialists over the coming years.

What's New

Educating Horse Owners: "Summer Sores" (Habronemiasis) by Dr. Samantha Miles

The hot and humid summer season has once again arrived in South Florida, and with the increase in damp weather comes an increase in pesky stable flies that can cause summer sores. With the help of the veterinarians at Palm Beach Equine Clinic, learn more about what summer sores are, how they are caused, how they be prevented, and finally, how to treat them.

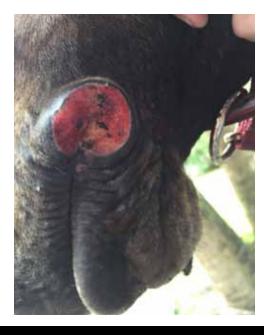
What are "summer sores"?

The equine stomach worm is Habronema muscae. Through the help of stable flies, their larvae are deposited onto wounds and

mucocutaneous junctions including the sheath, eyes and corners of the mouth. This causes a massive inflammatory reaction which then forms granulomas: the "summer sore".

How do they occur?

Adult stomach worms shed larvae into the environment through the manure of infected horses. These larvae are then ingested by maggots and develop within these maggots as they become adult flies. They reside in the mouthparts of the flies where they are deposited onto the wounds or mucocutaneous



junctions of horses causing an infection.

Horses can ingest these larvae by consuming dead flies in feed or water. The larvae continue development in the stomach of the horse and begin laying eggs within eight weeks but cause very little clinical signs in the horse. Usually, the horses just shed the eggs in their manure to contaminate the environment.

Some horses are shedders, but even a wormed horse can get summer sores. This is because the larvae that cause the massive inflammatory reaction are actually already dead. It is the body's immune response to the dead larvae that causes the intense itchiness and summer sore formation. Resolution of these wounds is very intensive.

Key to Therapy: Early Aggressive Treatment!

Some immune responses are greater than others, so how do we prevent this reaction? The best response is an early response. Intensive medical intervention is necessary when a summer sore first arises.

Debulking is often necessary to remove the dead larvae from the sore. Usually this is aggressive and has to be repeated. The area needs to be covered at all times if possible and a medicated ointment applied daily. PBEC carries a Summer Sore Cream that is produced in our pharmacy to help combat the immune response of summer sores and quicken the healing time.

Cryotherapy has also proven successful in some cases. This involves the freezing of summer sores with liquid nitrogen. Some of our veterinarians have found success using

immune mediating products. Please call for more information.

An oral deworming product is often administered to the entire stable of horses when a summer sore is seen in case your horse is carrying the adult Habronema worms in the stomach. Fecal worm egg counts do NOT detect Habronema larvae so worming should always be a primary step in the control of summer sores.

Prevention is better than treatment!

Fly control is also an important step.

SOLITUDE IGR is an oral feed additive that acts as an insect growth regulator containing cyromazine. This prevents the larvae from developing exoskeletons so they cannot become adults. It does not get absorbed by the horse but passes through their digestive tract to be passed in their manure. The maggots then ingest the cyromazine while feeding on the manure and the immature fly will die before spreading Habronema larvae. This significantly reduces the fly population in just 4-6 weeks.

Other ways to control flies are less effective than SOLITUDE IGR's near 100% success rate in inhibiting fly formation, however they should be attempted. Removing manure as often as possible from the stall and keeping it away from the stable are good ways to limit fly transmission of Habronemiasis to your horse.

Remember to always cover open wounds as soon as they appear.

In the event of stubborn resistant summer sores, the answer is often surgery.

Some horses need surgical intervention



to remove all of the granulomatous reaction and dead larvae within the summer sore. Our surgeons remove many summer sores each year with fantastic success!

Prevention is the most effective way of controlling summer sore outbreaks.

At the first sign of a summer sore, contact your veterinarian at Palm Beach Equine Clinic at 561-793-1599 to discuss treatment and develop an effective fly management program for your barn.







Resolution of advanced summer sores may require intensive treatment, including surgery. The examples shown here include images taken before, during, and healing after the surgical removal of infected tissue.

Horse Health Care Tips: Hydration and Sun Protection in the Summer Heat by Lauren Fisher, Jump Media

In the summer months, it is extremely important to be aware of how the heat and sun can affect our horses. As the summer heats up around the country and especially in Florida, Palm Beach Equine Clinic would like to remind all equine owners to keep their horses in a cool, well-ventilated environment with protection from the hot weather. There are many problems that can arise in the summer months from overheating, to dehydration, and even sunburn that owners should always keep in mind.

All horses should have access to shade and cool water throughout the day. Any exercise should be scheduled when the temperatures are lower, usually earlier or later in the day. Turnout should be limited to the night or cooler portions of the day, and fans can be provided indoors during extreme heat.

The average horse drinks between 5 to 10 gallons of water per day. It is important to provide clean, fresh water at all times and be aware of increased water necessities during extremely hot days.

Sodium in your horse's diet is very important to maintaining proper hydration. Providing a salt block or supplementing with electrolytes can help ensure that your horse is meeting their sodium requirements.

Especially in the extreme summer heat, horse owners should pay attention to the amount of sweat their horse is producing. Anhidrosis, or the inability to sweat normally, can be a common challenge for our equine partners in the summer months, particularly in hot, humid climates. In addition to lack of sweat, signs of Anhidrosis can include increased respiratory rate, elevated temperature, areas of hair loss, or dry, flaky skin. If you notice any of these signs, contact your veterinarian immediately.

Horses with white on their faces or bodies are especially prone to sunburn and should be protected from the harsh UV rays of the sun. Providing shade, covering your horse's skin with fly sheets or fly masks, and applying sunscreen are all helpful ways to prevent a burn. Fly masks are now made with extensions to cover the nose and muzzle. There are many different sunscreen products made specifically for horses, but most products approved for human use are also safe for our equine partners. Once again, horses that are particularly prone to sunburn can be kept cool and safe from the sun by staying indoors





during the day and being turned out at night.

These are just a few of the important issues to

be aware of during the hottest time of the year

in Florida and around the country. Remember to keep your horse cool, well-hydrated, and protected from the heat and sun.

Contact one of the veterinarians at Palm Beach Equine Clinic to learn more about precautions that can be taken to keep your horse happy and healthy throughout the summer months. For more information, call 561-793-1599.