

Disease Du Jour Episode 55 Transcript

COMMERCIAL

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END COMMERCIAL

PODCAST STARTS

Kim Brown: Welcome to this episode of Disease Du Jour on the topic of the "Equine Disease Communication Center Review of Diseases" with Dr. Nat White. Dr. White was the driving force for the creation of the EDCC. A Professor Emeritus of Equine Surgery at the Marion DuPont Scott Equine Medical Center in Leesburg, Virginia, White and I will discuss the past two years of disease reports from the Equine Disease Communication Center.

I'm your host Kim Brown publisher of EquiManagement.

As a little bit background on the EDCC: It's an industry-driven initiative that works to protect horses and the horse industry from the threat of infectious diseases in North America. EDCC is designed to seek and report real-time information about diseases, similar to how the Centers for Disease Control and Prevention—or the CDC—alerts the human population about disease in people.

The first priority of the EDCC is to protect and improve the health of horses in North America. Real-time information on infectious disease alerts, quarantines and regulations are vital to helping horse owners keep their animals safe and healthy. Infectious disease alerts have profound and lasting effects on the local economy and can result in millions of dollars lost due to horses being out, quarantines, canceled events, and resources that are allocated to containing the outbreaks. There's also decreased horse movement in an area where there's an outbreak.

The EDCC works to provide up-to-date, completely verified and easily accessible information that's easy to understand for equestrians in every facet of the industry.

In this way, the EDCC helps to decrease the economic impact of an infectious disease on the \$122 -billion horse industry.

The Disease Du Jour podcast is brought to you in 2021 by Merck Animal Health.

Welcome to the podcast Dr. White.

Dr. Nat White: Thanks, Kim. I appreciate being able to participate in your podcast today.

Kim Brown: First, I just want to thank you for all the hard work and the blood, sweat and tears you put in to getting the EDCC launched. I know this was a project that you worked very hard on to get support and get it up and running, and it is very valuable to the industry.

Can you tell us where do these disease reports come from?

Dr. Nat White: Reports are the basis for our information. And I think it's good to emphasize that the whole idea of this is to prevent disease spread and also to prevent rumors from spreading, which can shut down the industry.

Reports come from state veterinarians, as well as attending veterinarians. And if the disease is reportable, the state veterinarian will send us an alert. They fill out a form on the website with the information we need, and we take that and make an alert, which goes out daily, or in some cases as soon as we know there's an emergency.

Kim Brown: And you mentioned reportable diseases. So, what would some of those be and why are some diseases reportable in some states and not in others?

Dr. Nat White: Each state makes up their mind about which diseases are reportable. And some of those are important to the horse industry, such as equine herpes, strangles, other things like influenza, but not every state has the same list.

So, we don't always get the information from a particular state if that disease is not reportable. And if a veterinarian attending the disease doesn't send it to us.

Kim Brown: So how can veterinarians get involved in reporting these confirmed diseases? Even if they're not reportable in their state?

Dr. Nat White: Any veterinarians that have a disease that's confirmed by a test can go onto the website under the reporting of disease tab, and you can go there to fill out the form, which is online. Once you submit it, it will go immediately to the EDCC. And we'll also send you, send the veterinarian, an email with a copy of the alert. And then we take that and make it into the information in our database, where we store

the information and then eventually we make monthly and annual reports for the information.

I think any veterinarian can go in and get the alerts. There's, you know, a way on the website to sign in. It just takes your name and your email. And then when we send out an alert, everyone on that list gets the alert, which is basically a signal to go to the website for that particular alert or disease.

Kim Brown: And again, excuse me, the veterinarians can receive those, but anyone can sign up for the alerts or go to the EDCC Facebook to be aware of those alerts from EDCC, correct?

Dr. Nat White: Right. Owners as well as veterinarians or anybody that signs up for these alerts, will receive them. And it's also posted on our mobile app. So if you have that on your phone, it gives you an update on what the latest alert is, that mobile phone app has the latest alert and list of the alerts that happen. I'll mention that it also has the information, in Fact Sheets for both veterinarians and owners. It's got biosecurity recommendations. All of this is downloadable, or you can email it to your client. And that's why we think this is an important way to educate the horse owner.

Kim Brown: Yeah. And again, anyone can receive the alerts that go through the EDCC and are verified, but only veterinarians or state veterinarians can report a disease. So, it's not a horse owner reporting it; it is a veterinarian who has confirmed it.

Dr. Nat White: That's correct. It's important that we get that confirmed information that's accurate and reliable. And so, we always call if we need to, to find out the situation of the case and make sure it is accurate.

Kim Brown: And that's why this is so remarkable is that if it's a confirmed case, you know, as a veterinarian or a horse owner or an event supervisor or a stable or show facility owner, that this is information you can depend on.

And again, you mentioned, and we'll talk about these in a little while, there are lots of resources on there for veterinarians to share with horse owners or for horse owners to have access to themselves.

Dr. Nat White: Yes, that's correct. We have almost all the AAEP disease guidelines linked to the site. So, you can go in and get that immediately.

And it's become very important. Some of the big horse shows basically that had the herpes, we'd get calls, trying to find out where the disease is and so on.

I might say that when we get a report of a disease or a reportable disease, that state veterinarian can only locate that by county, and that's a liability issue.

So, we can't expose the exact facility or town or so on, but at least the information is out there, and people can seek from other media where the disease might be located.

I think one of the most important things about it is that with our alerts, we strive to show that that disease or that facility is quarantined. This gives a lot of relief to people to know that state veterinarians or their attending veterinarian's taking care of it. And there's little risk of any spreading disease.

Kim Brown: And just to give a plug to EquiManagement, we try to run all of these reports on our website and on our Facebook. And we try to put maps with them to give people a little idea of where we're talking about. And again, this would be a county map, not a "this is where the facility is," unless it's a racetrack that has been named in the, in the alert.

So, let's go back. Let's look at 2020, and the EDCC puts out information and you know, gives a great reporting of the cases. And, we just want to look maybe at some specific diseases and maybe some areas.

And then also to let people know that on those reports that are put out by EDCC, you can see more, like a graph of a trend line, so you can see, okay, well, if the vesicular stomatitis is going to crop its head up again this year, which it doesn't every year, but the last two years we've had some pretty good cases. It seems to be seen in April and into May to start out. So, it would be a good time to start looking for those clinical signs, those horses that may have it.

But we're going to sort of go through these alphabetically and talk about them a little bit. Some of the diseases on the list are more foreign animal diseases, and we haven't seen cases of them, but it's good to keep an eye on them.

Something like coronavirus, which in 2020 we did have a case in Arizona, one confirmed case.

But then we get to diseases like Eastern equine encephalitis, or EEE. We had 132 confirmed cases, confirmed cases. This is not suspect cases or, you know, people not reporting, states not reporting. This was confirmed. And that was in 12 states and provinces.

So having information like this, Dr. White, what does that help us, help veterinarians and horse owners, to understand.

Dr. Nat White: Well, we hope that one, specifically with a disease like EEE that people that know that it's in their state will take the advantage of getting the horses vaccinated.

It's so important to know that that is in the mosquito in that region and it's infecting horses and that you can get a vaccination from your veterinarian to prevent it. We know that it's also a sentinel for human EEE, and so some of the states will use that once we report it to say, they look for in mosquitoes, they look for the virus and maybe it can help prevent disease in humans.

Kim Brown: So that's, those are great points. And, you know, if historically you've had EEE in your state, and just to mention the 12 States in 2020 that had it were Florida, Georgia, Louisiana, Michigan, Minnesota, North Carolina, New Jersey, New York, Ontario (Canada), South Carolina, Virginia and Wisconsin. And that doesn't mean that's the only states that can have EEE or that it will reoccur this year. But as Dr. White said, we know that mosquitoes in that population of horses have spread this disease in the past.

Then you had, also on the list, have herpesvirus abortion, which in 2020 occurred in Ontario, Canada, and South Dakota. And we know this can vary from year to year. What would you say about the herpesvirus and others?

We're going to talk about abortion, neurologic and respiratory herpes, but for the abortion, what do you say to vets and horse owners?

Dr. Nat White: Well, I think the important thing with that again, is that the herpesvirus is obviously in that horse and potentially any horses that are exposed to that horse. And so again, it's important to know that that's there, that veterinarians will decide whether vaccination in that horse or of a group of horses is important in an attempt to try and prevent the abortion.

So, yes, knowing where it is, is important and this is why would you want to post it on our alerts?

I think the neurologic herpesviruses, one most people pay attention to, and it's much more prevalent. We just had in 2021, beginning of the year, we had 65 herpesvirus reported and 42 of those were neurologic.

And this is the time of year that they normally occur. And we've seen that in our postings.

Kim Brown: And again, for the abortion and the respiratory forms, there are vaccines and there is evidence that the vaccines can help in perhaps the neurologic form, although there is not a vaccine licensed for the neurologic form, correct?

Dr. Nat White: That's correct. We know that horses that have been vaccinated can still get the neurologic form of the disease. And there's lots of questions about why that's the case. We know that these horses can exist with the virus; it can be latent in

the horse. And then for some reason, from stress or some other activity or another disease, it gets activated.

And then in some of those cases, it ends up in the spinal cord and creates a thrombosis in blood vessels and causes these neurologic signs we see with ataxia and so on.

Kim Brown: And we, again, neurologic herpes has been a big topic this year because of the outbreak in Europe. And we had a previous Disease Du Jour podcast on herpesvirus. So, I don't want to over discuss it, but it's very important. I mean, as Dr. White said, there have already been reports this year. This year, there've been 65 cases of herpes and 42 of them neurologic in the United States, in North America. And in 2020, there were 16 states or provinces that had neurologic herpesvirus reported. And in 2019 there were 25 states and provinces.

So, this is, this is why it's spread. It can happen anywhere from Arizona to Wyoming and Texas to California. So, this is not something that you should ignore, you should pay attention to.

Dr. Nat White: Yeah. It's important. And we think, it's hard to tell, we think that this might be increasing potentially in the United States, in North America.

There is a recent case, I think it was Pennsylvania, where there was a variant that has not been described. And I think they're working on that, but it's important to know that this is, can be a fatal disease, up to 30% horses that are neurologic and have to be euthanized. And so it's, it's important to know where it is, and we try and keep up with it.

So that's one of the reasons, not all states, but most states, have this as a reportable disease because it is potentially a problem for the industry. The recent cases in Florida at the showgrounds, with the panic that it caused, really can be an economic problem, much less the welfare and health of the horses

Kim Brown: The next disease, equine infectious anemia, is one that we don't think about very much anymore. But it's something that this is what your Coggins test does for the horse owners. It lets you know if your horse has positive antibodies to this disease. But in 2021, there's been seven states and provinces with 45 confirmed cases this year. And in 2020, there were 17 states and provinces.

So why, why are we seeing this disease so much more since we should be testing for it when horses are moved?

Dr. Nat White: Well, the United States has had a good program to test for movement interstate. And so that's been very good. But there are still pockets of this disease in the United States and in Canada.

The other problem that recently, that we recently found was that horses from Mexico that come in for the racing illegally are carrying this. Potentially that and piroplasmiasis, from, mostly from dirty needles and exchange of blood in some fashion. So, some of those horses have gone to other states in the United States.

Of course, then that becomes a risk for horses that are exposed either by insects or again, having blood transferred in some fashion. So, it's not gone. And I think it's very important that we keep up our surveillance to make sure that we keep it under control. I think that it is, but you still find pockets where it obviously isn't, and in some cases hasn't been for years.

Kim Brown: And just as a word of advice, veterinarians have told me that if you want, if you rescue a horse, if you get something out of a kill pen, please make sure to use good biosecurity until your veterinarian can get that horse tested and checked to make sure that you're not exposing your horses and other people's horses.

Dr. Nat White: That's particularly true for any of them, but particularly true for strangles, which seems to occur more frequently from that type of source. And again, has been spread to states from kill pens.

Kim Brown: And again, strangles is one of those that you see in just about any state or province, it's easily spread. So tell us a little bit about some of the cases of strangles that EDCC has tracked.

Dr. Nat White: They show up ... particularly Florida seems to be a hotbed of this. And I don't think we know other than the fact that it's transmissible by direct contact mostly, and that includes watering troughs, other implements that come up with the horse, or by humans going from horse to horse.

And so, it's certainly in the population, although it's not as lethal as some of the other diseases, it can still be a problem. Then, now we know that that strangles can be hiding in the guttural pouches for weeks or months. And so, like herpesvirus, it's there, and how it gets out and becomes active again is not totally known.

Kim Brown: Yeah, I did see that Dr. Noah Colon has a research grant to try and come up with a better blood test to try and detect strangles. So, we'll keep our fingers crossed that we have maybe some better testing that we can find these horses.

But again, in 2021, I think you had mentioned there's been 41 reports of strangles already this year.

Dr. Nat White: Yes. And I probably should note that when we started this, we didn't have veterinarians participating as much as they do now. So just because we've only, we've had 40 some cases, that doesn't mean there aren't a lot more out there, because in some states that's not reportable. And as of now, we don't have a lot of

attending that veterinarians submitting, and I'm hoping that we can convince people to do that because it just helps them prevent the spread of these diseases.

Kim Brown: Yeah, it makes people more aware when you say, "Oh, okay, well, there's, there's already strangles being reported in Florida. Maybe I should be a little more biosecure and a little more careful with what I'm doing."

Dr. Nat White: And particularly if you're traveling and they come in contact with other horses, at shows and so on, that's where it spread.

Kim Brown: Right. And speaking of shows, we know that equine influenza is something that the USEF and FEI both have regulations on vaccination for equine influenza, but we see equine influenza across North America.

And what, what do you have to say about this disease?

Dr. Nat White: Again, it's not usually fatal, but it can shut down an operation, with fevers and so on.

And of course, it's very transmittable by aerosol. And so, it's there. It's out there. We got reports of it recently from Oregon, Rhode Island, Virginia, Washington. In fact, the Northwest seems to be a place where you see it commonly every year. So again, it's not as lethal, but horses get sick. It puts them out of commission for a while. And so it's good to know where it is so it doesn't spread.

Kim Brown: And again, because it's not a reportable disease in many states, it's really valuable if private practitioners who confirm that there are strangles that can help other horse owners and veterinarians to again, keep a better watch out for this and to warn their clients about moving horses and so forth.

Dr. Nat White: We encourage it and veterinarians who get a confirmed disease such as influenza, to enter that in the database. By going in and making out a report. In some cases that veterinarian's has sent us the information and also reported it to the state vet. And that's very helpful because we get the data that we need put in a database such as the signalment and the condition on the horse.

And then the state veterinarian, we always confirm it with them because it's their responsibility to make sure that everything's correct in their state. It's very helpful to have that attending veterinarian for any disease to send it to us and we'll report it.

Kim Brown: And, one disease we don't think of quite as much is pigeon fever. And a lot of people think that's really just, you know, in one location. And I mean, what do you have to say about pigeon fever?

Dr. Nat White: Well, it was mostly in the Western States, and California was one, some of those Southwestern States where it seems to be prevalent. But it is starting to creep across the southern states.

And we're also seeing it the Northwest, particularly this year, even in Canada. So, it's something that we don't think about. It is a disease that can be devastating to the horse, depending on where it locates. And in some cases, if it's internal, it may not be very treatable. So, it's always important to know what to look for and to get it tested when you see these abscesses,

Kim Brown: Potomac horse fever, which is another one that was named for the Potomac region, you think of it as a regional disease, but in 2020, it was in six states from Alberta, Georgia, Kentucky, Massachusetts, Tennessee, all the way out to Washington state. So, it is not a regional disease anymore, is it?

Dr. Nat White: No, it's not. We used to think it wasn't in the West until John Madigan did a lot of his work. And you know now that it's everywhere

Kim Brown: And again, that's something to just keep in as a differential diagnosis if you're looking at some of these horses.

I guess one of my pet peeves as a horse owner is every year, there's been at least one rabies case in horses reported, and this is a preventable disease. It's a disease that horses can get and spread to other horses and humans.

So, why do we not see better vaccination protection for this disease, Dr. White?

Dr. Nat White: Well, one of the things that the EDCC has exposed, and that's the lack of vaccination for many of these diseases. EEE is one where we get horses reported, and they've been unvaccinated.

So just like with rabies, it's out there, we don't think about it because it's rare, frankly, but, it's still something that can be devastating and a huge risk for humans.

So, I think that, hopefully as one of the things EDCC can do is to, is to go ahead and emphasize the need for vaccination for these serious diseases. And that veterinarians hopefully can convince their clients to do the same.

Kim Brown: Yeah. And, and for those who don't think that that rabies is in the Western States—cause I heard that when I moved from Kentucky to Wyoming—in 2021 rabies was confirmed in Colorado. So, it can be anywhere that there's wildlife that can carry it.

When we're talking about some of these other diseases, vesicular stomatitis we had mentioned before, that's not something we see every year, and it is more of a

geographic disease, but we saw it spread quite a bit to different states in the last few years.

What do you say about VS?

Dr. Nat White: Normally it's considered to come from Mexico, where the insect vectors are. And so depending on the environment, that insect vector can survive, and VS will spread wherever it goes. And so mostly it's in the Western states and usually the Southwest where we start seeing it first.

And the EDCC doesn't count every case. Basically the USDA is involved with this disease and keeping track of it.

So, we count premises, assuming that the horses affected then others will probably be affected. And there's a very strict quarantine for those facilities, again, controlled by the USDA. Our job is to report it, so people know where it is

Kim Brown: And one that we have been dealing with in this, the United States, North America for, gosh, it's been over a two decades now, is West Nile virus. And again, it's one of those that can be anywhere. So, what is your advice to veterinarians and horse owners about West Nile?

Dr. Nat White: We have a good vaccine for this. And even though recently we've seen less cases, and I'm not sure if that's because there's more vaccinated or if because it's not as virulent anymore. But it's, it can be a serious disease, and it should be vaccinated for because anywhere there's a vector mosquito, so on and they're at risk. And I don't think we're going to wipe it out.

Kim Brown: And again, this is one of those that, in 2020, it was in 12 different states from California and Colorado, Florida, Kentucky, Mississippi, Ontario, Utah, Virginia. I mean, it was, it wasn't just located in one place. And in 2019, it was in 16 states and provinces, and not the same ones. And it's just something that, that has to be considered in your vaccination protocols as Dr. White mentioned.

And then, when we talk about EDCC, this is the reporting. The disease alerts are really important, but as we mentioned before, there are fact sheets and biosecurity recommendations that are created for owners as well as links to the AAEP guidelines.

And they can all be viewed and downloaded from the website and the EDCC mobile phone app that veterinarians can send on to owners.

Why did you think that was so important to have available on the EDCC?

Dr. Nat White: The only way we're going to control and stop the spread of these diseases is if people are educated as to how that happens and how they need to vaccinate their horses.

And so, one of our missions is to educate particularly the horse owner and hopefully the veterinarian in educating the horse owner by providing the information online that can help explain the disease and help explain how to prevent it. To me, this is one of the most important things that we do is to try and educate people about the disease, how it spread, how you can prevent it.

And so, biosecurity is huge for us, and we keep all these things up to date. The AAEP Infectious Disease Committee helps us review the fact sheets to make sure they're accurate. And those are reviewed by the AAEP every three years. And more often if there's an immediate change.

So, we think, well, I'm hoping that veterinarians will utilize this and have them, the fact sheets, distributed to their clients when they're faced with a disease.

Kim Brown: And is there anything else Dr. White, that you would like to say specifically to veterinarians listening to this podcast about the EDCC?

Dr. Nat White: Well, I've always wanted it to be a universal source for where you going to get disease information and current activity of disease on the alerts. It's important to remember that this is totally funded by the horse industry, and that includes owners, veterinarians, practices, horse organizations and associations, as well as companies.

And it won't exist unless that happens and continues to have good support.

So, we urge veterinarians to help either by donating or by having their clients understand how important it is and also they can donate.

Kim Brown: And the website and app both make it very easy. There is a support tab on the toolbar that you can click on and learn how that you can make donations to the EDCC to keep this very credible information out there that does help horse owners as well as veterinarians understand the diseases that are pertinent now.

Dr. Nat White: It's important to know that the, the funding for this goes into AAEP's Foundation for the Horse, and there's an EDCC fund there, and all donations are tax deductible.

Kim Brown: That's a great point. So, you can make a donation right through the EDCC website. You can send a donation to the AAEP Foundation marked for the EDCC. And that's a good point that this is great charity to support, if you will, that will help you in the long run.

Is there anything else we need to cover today Dr. White?

Dr. Nat White: No, I think you've done a great job.

Kim Brown: Well, thank you. Thank you again for being the, the brains and the brawn that brought this about that's done such good for the industry.

And we want to thank our listeners, too, for joining us today. And again, remember that the EDCC is industry funded and nonprofit. So, if you can help support this group, that would be wonderful.

Thank you for listening to Disease Du Jour, and a special thanks to our 2021 sponsor Merck Animal Health. You can listen to previous episodes of Disease Du Jour on iTunes, SoundCloud, or Stitcher, or your favorite podcast platform.

And if you have any questions or suggestions, send an email to me at kbrown@equinenetwork.com.

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