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CALENDAR OF EVENTS:

Deputy Veterinarian Training:
Sep 24, 2015, Helena

Board of Livestock:
Aug 17-18, Helena

MVMA Fall Meeting:
Sep 10-11, Bozeman

Montana Stockgrowers Association Trade Show and Convention
Dec 3-5, Billings

State Veterinarian Notes

HEARTWORM FINDINGS: In the June 2014 issue of the newsletter, we reported a high rate (15 dogs) of heartworm infection diagnosed by one clinic in Flathead County. A number of you expressed interest and skepticism regarding the accuracy of those results. This skepticism proved to be well founded; upon checking with the reporting veterinarian this spring, we learned that through follow-up testing at an independent laboratory, all of the animals were confirmed to be heartworm negative. A few of the pets had already gone through treatment, so while we suspect that all of the cases were false positives, this can't be confirmed. I apologize for the error.

We continue to receive sporadic reports of heartworm (a reportable disease per Administrative Rule 32.3.104) with the latest being reported from Billings on a seven year old male golden retriever that had been adopted (no prior history).

LEGISLATIVE UPDATE: A number of positive developments came out of the legislative session. Most significantly, \$896K was allocated for the Montana Veterinary Diagnostic Laboratory (MVDL). This amount represents 41% of the laboratory budget, which not coincidentally, is the proportion of MVDL diagnostic testing that takes place for zoonotic diseases. Because of the public health significance of zoonotic disease testing, the Montana Veterinary Medical Association, and a number of livestock groups supported this allocation of general fund dollars. This allocation is a three-fold increase over the previous budget. General fund and laboratory fees now cover

most of the laboratory budget; per capita funds which were previously allocated to MVDL will be available to cover other departmental operations.

A bill granting DOL additional authority to address incursions of feral hogs became law. More states have feral swine than those that do not. This invasive species creates destruction of agricultural and wildlife resources in many states and Canada including Saskatchewan and Alberta. An interest in hunting of feral swine is responsible for much of the range expansion as aspiring hunters seed swine into new areas. SB100 establishes a reporting requirement, and makes it illegal to possess, release, feed, hunt, trap, or kill feral swine. Profiting from any of these activities is also illegal. This bill addresses shortcomings to DOL authority as well as FWP laws which typically have a greater emphasis on game species.

RULES ADOPTED: At the June meeting, the Board of Livestock voted to adopt administrative rules on provisional deputy veterinarians, brand requirements for Canadian origin cattle, and health certificates.

Veterinarians wanting to do regulatory work (health certificates, or official testing) in Montana can now be granted 'provisional' status until they can attend the official deputy veterinarian training.

We now have the ability to exempt Canadian imported cattle from needing the CAN brand if traveling to an exhibition, bull stud, or for other reasons when considered on a case-by-case basis by the Board of Livestock.

Lastly, the rules will allow other exemptions to import requirements on a case-by-case basis if the exemption does not create a threat to Montana's livestock or public health. We've had numerous examples where an exception is requested for rabies vaccination, a recently expired diagnostic

- WHAT'S NEW:**
1. Input requested on 6 Month Horse Passports (p3).
 2. High Path Avian Influenza (p4).
 3. Rules for exemptions adopted (p1).

Brucellosis Update

QUARANTINES RELEASED FROM 2014: Both brucellosis affected cattle herds that were detected last fall are released from quarantine. The Park/Carbon herd was released in the middle of March, while the Madison County herd was released in April. The timing of the quarantine release was contingent on a negative post calving test. Neither herd found any additional reactors aside from the singleton positives found on the initial fall herd test.

The USDA conducted a review of the epidemiological investigations and recommended several practices to improve traceability and communication between the federal and state office. The review also recommended that DOL assess whether expenditures on bison management are the most effective use of federal resources for mitigating the risk of brucellosis to livestock. Lastly, the review recommended that the state of Montana stop using the term “herd plan” to denote agreements between DOL and the cattle operator. While the rationale for this recommendation is somewhat complicated, the goal is to avoid confusion for other states that may interpret the percentage of herds with herd plans with the level of compliance with DSA regulations.

NATIONAL ACADEMY OF SCIENCES REVIEW: The National Academy of Sciences (NAS) provides advice on pressing challenges relating to science or technology. NAS is reviewing the issue of brucellosis in the Greater Yellowstone Area. The study will “examine the feasibility, time-frame, and cost-effectiveness of options to contain or suppress brucellosis across the region.” As part of this effort, a small working group will evaluate the role of feedgrounds, predators, population size and distribution of the disease. Mitigation strategies of the three states with brucellosis in wildlife will also be examined. A report is expected in late spring 2016.

The NAS reviewed the brucellosis issue in 1998, however, brucellosis has subsequently increased dramatically in elk, bison have been provided additional habitat in Montana,

and there has been further study on vaccines and persistence of brucellosis.

IBMP REDO: The Interagency Bison Management Plan (IBMP) is now 15 years old and the state of Montana and National Park Service have begun work on a new bison plan. Public comment was requested on several preliminary alternatives ranging from continuing current management, minimal management, aggressive management and several possibilities in between. Comments on the ‘scoping’ will determine the exact nature of the alternatives to be evaluated over the next 12 to 18 months.

Much like the NAS effort described above, this process will consider the changed circumstances over the last 15 years. Several commenters suggested that this effort should be delayed until after the NAS completes their assessment.

ELK SURVEILLANCE STUDY: Montana Department of Fish, Wildlife & Parks (FWP) is tracking 88 elk collared over the last five years. Tracking collars were placed on all field tested brucellosis positive elk and numerous negative animals. Vaginal transmitters (VITs) were placed in seropositive elk that were also pregnant. A total of 22 elk with VITs are being tracked; nine of which are in elk captured this January in Mill Creek (Paradise Valley near Emigrant) where 16 of 30 (53%) elk were positive.

As of the June surveillance report, 18/22 VITs have been expelled. Ten of these have been confirmed as live births with the remaining 8 being suspected live births based on timing and cow behavior (see table bottom left).

The study suggests that most seropositive pregnant elk have normal term pregnancies and live calves. Interestingly, few birth materials cultured through the study have been positive for brucellosis. Of the 18 VITs expelled this season, 14 have so far tested negative for *Brucella*, and 4 are pending. Average time from VIT ejection to sampling is 17 hours, so sample degradation in the field is a possibility. Regarding timing of abortions, FWP cites a paper by Paul Cross (U.S. Geological Survey) which states that the risk of abortion in March, April, and May is 5 times higher than January February or June.

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Status of elk calving events and culture results from the elk capture and collaring study.
Source: Montana Department of Fish, Wildlife & Parks.

Area	Confirmed Live Birth	Suspected Live Birth	Unknown	Still Tracking	<i>Brucella</i>
Blacktail	1	1	0	1	Not Detected
Sage Creek	3	1	0	0	Not Detected
Black's Ford	2	2	0	0	Not Detected
Mill Creek	4	3	1	1	Not Detected
Greeley	0	1	1	0	Not Detected

Sample Submissions to MVDL

Economical, expedient and reliable shipping is a priority for getting samples to the Montana Veterinary Diagnostic Laboratory (MVDL). Unfortunately, the caliber of service provided by the United States Postal Service (USPS) has diminished in recent years.

We recommend that you familiarize yourself with delivery time frames of shipping options and obtain a tracking number for every shipment. Please also take care in packaging your samples including a clear label, leak proof specimens cushioned with absorbent material, sealed in protective bags with adequate cold/hot packs to maintain ideal temperature with dry, clean, and complete paperwork.

USPS shipping options include:

Priority Mail Express: Guaranteed overnight.

Priority Mail: 1-3 business days based on origin, destination & drop-off time (no money-back guarantee).

First Class Mail: 1-3 business days for envelopes & small packages weighing up to 13 oz. (packages weighing more than 13 oz. become Priority Mail).

Standard Post: 2-8 business day ground service for less than urgent deliveries & oversized packages.

We've experienced several instances of USPS parcels getting lost. When these packages do finally arrive at the MVDL, sometimes after 10-12 days, they typically don't have a tracking number and often the samples have degraded and are no longer suitable for testing.

Tracking numbers aren't always provided (e.g. often not applied to packages dropped in PO boxes after hours). Without a tracking number we can't determine where your package got "lost" (we've also had package delays on parcels with a tracking number, but we're able to find where the delay happened and contact a postmaster to address the issue).

Many of our clients have switched to private carriers (FedEx or UPS) with good success. MVDL is investigating options for reducing private carrier costs (e.g. pre-paid mailers, bulk account billing). ☒

Tess Moore

Quality Manager

Montana Veterinary Diagnostic Laboratory

Six Month Horse Passports

The Six Month Horse Passport program is an extended health certificate offered to horse owners traveling to California, Idaho, Montana, Oregon, and Washington. While equine owners need to jump through some hoops (such as submitting their itinerary) to receive this extended health certificate/permit, the program is ultimately more convenient for frequent travelers than getting several 30-day health certificates and individual travel permits during the summer.

During previous communications, I've expressed concern over the low compliance in the program. We have little information of where these animals travel, and we are therefore not able to alert equine owners about any emerging risk. Even more significant, this program runs counter to animal health principles where horses at highest risk of disease exposure (frequent travelers that participate in group trail rides, rodeos and other events) have the most leeway in animal health requirements. For this reason, we are considering eliminating this program after this summer.

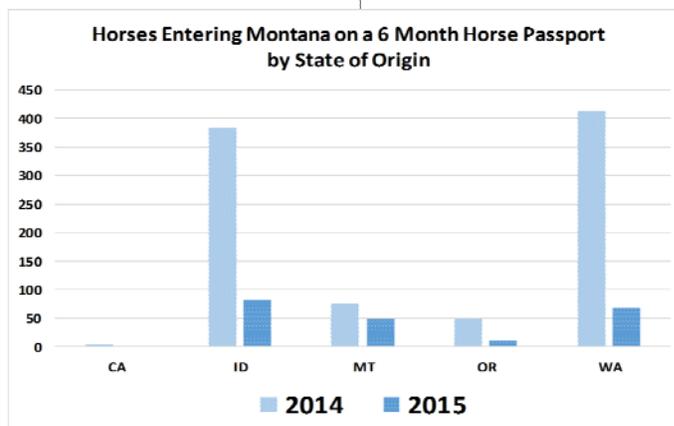
The Horse Passport program is described in Administrative rule (32.3.216 Horses, Mules, and Asses). Therefore, any significant changes would require a rule change and I wanted to get your feedback before we proceed. How important is this program to you and your clients, and do you feel it would be highly disruptive to eliminate it?

In 2014, the state of Washington was the biggest user of the program with 413 horse passports into Montana, followed closely by Idaho with 384 (see chart).

It's worth noting that while the states of California, Idaho, Montana, Nevada, Oregon, and Washington started the program, California no longer issues horse passports, and Nevada longer honors certificates issued through the program.

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Equines entering Montana on Horse Passports by issuing state.



Avian Influenza (AI)

The ongoing High Path Avian Influenza outbreak has become the most costly animal health disease incident in U.S. history. The economic impact is due to direct animal losses, cost or response efforts, trade restrictions, and consumer concerns influencing purchasing decisions.

AI is caused by an RNA, type A influenza virus and is classified by the surface proteins hemagglutinin (H) and neuraminidase (N). The pathogenicity, high pathogen (HP) or low pathogen (LP), is determined by its genetic makeup and surface protein. LPAI viruses cause mild to no clinical signs. HPAI viruses however, are highly contagious and are more likely to cause death loss.

In December 2014, HPAI was diagnosed in migratory waterfowl and domestic birds in Washington state. Since then, three highly pathogenic strains, H5N1, H5N2, and H5N8, have been identified and have affected more than 48 million birds in the US poultry population in 20 states.

Although mutations are common and interspecies transmissions can occur with influenza viruses, the human health risk with the

current outbreaks is low and there have been no reported cases of human illness according to the Centers for Disease Control (CDC).

by USDA provided some additional insight regarding the spread of HPAI in some of the hardest hit areas. A genetic analysis found identical strains of HPAI virus on multiple premises suggesting transmission between premises rather than exclusively wild waterfowl origin. The likelihood of direct transmission is supported by observations of lax biosecurity practices where individuals and traffic were moving between positive and negative premises.

USDA also found small amounts of HPAI genetic material at a distance of 1000 meters from affected houses. Viable virus was collected in the air of an affected barn. Additionally, USDA found a correlation between sustained, high winds and premises testing positive along the vector of the wind direction several days later. These findings need further follow up.

PREPAREDNESS: DOL recognizes the risk to commercial poultry operations in our state and is preparing to respond to an outbreak when the diagnosis is made. The focus of our efforts has been on depopulation, disposal, and response team education and safety.

The depopulation method used will depend on the size and type of the flock infected. Currently CO2 chambers and fire-fighting foam enriched with carbon dioxide are being used in larger outbreaks in the mid-west.

After birds are euthanized, disposal becomes the next challenge. Options include composting, burning, or burial at a landfill.

States such as Iowa and Minnesota who are dealing with large outbreak situations have had assistance from USDA response teams. This resource should also be available for Montana and communication with these personnel is ongoing.

WATERFOWL RECOMMENDATION: DOL has recommended that privately owned waterfowl sit out this coming show season due to the high risk of waterfowl transmitting HPAI to a domestic bird or flock. Exhibitions are an increased risk when dealing with contagious diseases because animals are traveling from multiple sources and are concentrated in one area during the event. ☒

By Anna Samson
Class of 2016, CSU College of Veterinary Medicine, with mz

Poultry biosecurity poster developed by DOL for fair season. Available in full color on the DOL web site at www.liv.mt.gov, or contact us at 406/444-2043 for a laminated copy.

Source materials developed by USDA.

POINTS FOR HEALTHY POULTRY

1 KEEP YOUR DISTANCE
Restrict access to your birds from wild waterfowl and visitors who own birds.



2 KEEP IT CLEAN
Reduce the risk of disease spread through good sanitation. Wear dedicated footwear and clean clothes when caring for birds.



3 DON'T BORROW DISEASE FROM YOUR NEIGHBOR
No sharing equipment, tools, or supplies without cleaning and disinfection.



4 DON'T HAUL DISEASE HOME
Anything brought into your poultry area has the ability to spread disease, including other birds, visitors, and you. Clean and disinfect. Isolate new additions.



5 KNOW THE WARNING SIGNS OF POULTRY DISEASES

- Death loss
- Sneezing, coughing, nasal discharge
- Diarrhea
- Lethargy, poor appetite and egg production
- Swelling of eyes, neck, or head
- Discoloring of wattles, combs, or legs.



6 REPORT SICK BIRDS
Report sick or dying birds immediately to Montana Department of Livestock at 406-444-2043.



Electronic Forms and Records

An investment in electronic systems has the potential for to save you time and reduce the number of errors in the regulatory portion of your daily practice. Efficiencies can be gained in several areas.

LESS PAPER: With electronic test charts, vaccination certificates, and health certificates, the need to keep traditional paper forms on hand is gone. This helps reduce inventory of paper health books.

REDUCED POSTAGE: Many systems have automated reporting incorporated which means no more looking up addresses for states of destination, no more sorting forms, and no more postage for shipping paper to Helena.

BETTER RECORDS MANAGEMENT: DOL tries to have realistic expectations of what records a practicing veterinarian is able to keep. Under the federal traceability rule, veterinarians are required to maintain records on tag distributions and animal movements for 5 years for most species. Electronic records allow you to do away with boxes of old health books and vaccination certificates, plus they provide the opportunity to store all of your records in an orderly and easily searchable format. Just like your clinic data, it's important to have a data backup system.

MORE ACCURATE DATA: The fewer times data is handled between the animal and a state or federal database, the less chance for transcription or other errors.

A BETTER PRODUCT FOR YOUR CLIENT: The ability to immediately email a copy of a vaccination certificate or health certificate may be appealing to producers. Additionally, for electronic systems that are able to collect multiple fields of data (pregnancy status, body condition, etc...) about individual animals, that data can be shared with the producer to improve herd management records.

POTENTIAL FOR REDUCING/ELIMINATING NEED FOR IMPORT PERMITS: Paper health certificates won't reach an animal health office until well after the animal movement is complete, so import permits were developed to provide real-time information. With electronic systems that are able to facilitate rapid reporting of animal movement (health certificates) data to our office, we're looking at ways to reduce or eliminate the need for import or re-entry permits for veterinarians who can electronically provide us this information.

There is an investment in time, money, and training for you to transition from traditional paper systems. There are some great examples of currently available electronic technologies for health certificates which offer a low crossover threshold and are well worth the investment. These include:

PDF eCVI: A simple, fillable health certificate form that can be electronically signed for printing. The final product is then emailed to our office for reporting purposes.

iPAD iCVI APP: A free app from the Apple App Store that allows you to generate health certificates and print or email to your client. Reporting is automated.

USDA's WEB-BASED VSPS and VEHCS SYSTEMS: Internet based programs for interstate and international certificates, respectively. Final documents are printed. Reporting is automated.

The table below shows how these options stack up on certain key features. ☒

By Tahnee Szymanski, DVM

PRODUCT	HARDWARE*	SOFTWARE	COST*	INTERNET TO COMPLETE
Fillable PDF	Windows PC	Adobe	\$0	No
iCVI	iPad	iCVI Application	\$0	No
VSPS	Windows PC	Web Browser	\$0	Yes
VEHCS (International shipments only)	Windows PC	Web Browser	\$0	Yes
*We're making an assumption that all clinics have a personal computer (PC), so this cost is not included in the analysis.				

State Veterinarian Update (cont'd)

(State Veterinarian Notes continued from page 1)
test, or to allow a test that is pending or on arrival.

Montana state veterinarians have historically exercised the authority to consider import requests on a case by case basis. As I wrote in the December's state veterinarian column, DOL has proposed to put in rule this long standing authority which up to this point has been mostly informal.

While most of the comments we received were supportive of this rule change, a few expressed concerns that the discretion we are requesting is new and puts too much authority in the state veterinarian's office. Subsequently, I conducted interviews with prior Montana state veterinarians, and conducted an online survey of other states.

Based on this review, we found that all prior state veterinarians at DOL going back to 1984 (Drs. Linfield, Gertonson, Siroky, Ferlicka) exercised discretionary authority to grant exemptions on a case-by-case basis if the waiver did

not create a threat of disease. The survey of other states' handling of exemptions requests (43 responses), show that:

- Over 75% (31/41) of the states have the ability to evaluate requests based on special circumstances.
- For those 31 states with such authority, the discretion in over 80% (25/31) of states lies with the state veterinarian's office.
- Finally, regarding the policies of our neighboring states of Idaho, North Dakota, Oregon, South Dakota, Washington and Wyoming, they all a) allow exemptions, b) the authority lies with the state veterinarian's office and c) requests are considered the same day or within a week.

We'd like requests for exemptions to be rare, but also recognize livestock producers and animal owners are best served by a system that is responsive to special circumstances.

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Import Permit Office
(406) 444-2976

We're on the Web:
www.liv.mt.gov



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Import line: 406-444-2976
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Montana Department
of Livestock