

## Mission Statement

The Animal Health Branch is California's organized, professional veterinary medical unit that protects livestock populations, consumers, and the State's economy from catastrophic animal diseases and other health or agricultural problems.



CALIFORNIA DEPARTMENT OF  
FOOD & AGRICULTURE

# Animal Health Branch Newsletter

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## Virulent Newcastle Disease Update Regional Quarantine is Lifted in Southern California

By: Felicia Pohl, BS; and Elise Kishi Chad, DVM, MS



On June 1, 2020, the California Department of Food and Agriculture (CDFA) and the U.S. Department of Agriculture (USDA) announced the end of the Regional Virulent Newcastle Disease (vND) quarantine in Southern California, allowing poultry to again move freely within the State.

Virulent Newcastle Disease was first detected in May 2018 in Los Angeles County. By December 2018 the virus had spread extensively in multiple counties in Southern California affecting backyard poultry and commercial flocks. Through the span of the vND outbreak, 476 flocks and over 1.2 million birds were affected by this devastating virus. After prolonged disease control efforts, the last confirmed positive case was detected in February 2020. Extensive testing of the regulated area has been completed, with no additional detections of the disease.

*"We have eagerly anticipated this day and are extremely proud of the tireless work of the Virulent Newcastle Disease Task Force," said CDFA Secretary Karen Ross. "While we extend gratitude to the hundreds of dedicated and skilled USDA, CDFA and California Animal Health and Food Safety Laboratory System employees who worked for over two years to achieve this goal, often in adverse conditions, we also want to thank the thousands of poultry owners in Southern California who made the sacrifices and investments needed to eradicate this virus from California."*

To continue to protect California's flocks, all backyard poultry owners and commercial operations are encouraged to practice biosecurity measures to help prevent the introduction of disease when people enter or leave the property, routinely check birds for signs of illness, and report any signs of suspected vND or an unusual number of sick and/or dead birds (Sick Bird Hotline 866-922-2473).

As a reminder, poultry entering California must either have a Certificate of Veterinary Inspection demonstrating good health or a National Poultry Improvement Plan (NPIP) Program certificate.

*(Continued on page 2)*

## Virulent Newcastle Disease Update - *continued*

CDFA retains the authority to monitor and test poultry to prevent or mitigate any future infections. Additionally, CDFA and USDA, in partnership with many bird enthusiasts in Southern California, have established a community-focused group, known as the California Avian Health Education Network (CAHEN), committed to on-going monitoring for disease, continual support for biosecurity training, and promotion of poultry health in general. See **pg. 8** for more information.

*California State Veterinarian Dr. Annette Jones: "We hope to continue working with bird owning communities to prevent a reintroduction of widespread disease so that we never have to place an areawide VND quarantine in Southern California again."*

Background: Virulent Newcastle disease is a virus that affects birds with particularly lethal effects on poultry, affecting the digestive system, nervous system and respiratory system. It is not normally found in the United States. It spreads quickly between birds but is not considered a human health threat. Its presence can be so detrimental to poultry health and the food supply that it triggers state, federal and international regulatory response. While this virus has been introduced and eradicated from more than 15 U.S. states since 1950, the largest outbreaks occurred in California in 1971-1974 and 2002-2003 following a similar pattern but with wider spread than the recent 2018-2020 outbreak.

## Foreign Animal Disease Investigations April 1 - June 30, 2020

By: Alireza Javidmehr, DVM, MPVM, PhD

The California Department of Food and Agriculture (CDFA) Animal Health Branch (AHB) and the United States Department of Agriculture (USDA) Animal and Plant Health Inspection Service (APHIS) Veterinary Services (VS) personnel investigated two hundred and thirty-five (235) Foreign Animal Disease (FAD) suspicious cases from April 1 to June 30, 2020 (Table 1). Any animal diseases presenting similar signs to FADs must be treated as such until FADs can be ruled out.

Seneca Virus-A (SVA) infections among the swine shipped to slaughterhouses in the Modesto area triggered one hundred seventy-five (175) FAD investigations, almost seventy-four percent (74%) of all statewide FAD investigations. SVA is an endemic disease in California, but as the symptoms are identical to those of Foot and Mouth Disease (FMD), compatible lesions must be considered possible FADs until testing confirms otherwise.

Rabbit Hemorrhagic Disease Virus type2 (RHDV2) was confirmed in a wild rabbit population in Southern California for the first time in early May 2020. RHDV2 is highly contagious and lethal to both wild and domestic rabbits, hares, and possibly pikas. Thus far, all samples taken from domestic rabbits in California are negative, indicating RHDV2 has not entered the California domestic rabbit population. Rabbit owners can protect their animals by following strict biosecurity measures and vaccination in consulting with their private veterinarian. More information about the RHDV2 can be found on [the AHB webpage](#).

To protect California's livestock industry and for food supply security, private practitioners, diagnostic laboratories, animal hospitals, and producers must report signs of the emergency conditions outlined in the California "[List of Reportable Conditions for Animals and Animal Products](#)" within twenty-four (24) hours by calling the CDFA AHB or the USDA APHIS VS District Office in their area. The AHB district offices' contact information can be found on the last page of this newsletter.

*(Continued on page 3)*

## Foreign Animal Disease Investigations - continued

Table 1. Summary of FAD investigations from April 1 to June 30, 2020

AHB Districts	Disease	Species	Sample Type	Number of Investigations	Destination Lab*	NVSL Result
Modesto	Foot and Mouth Disease (FMD), Seneca Virus-A (SVA)	Porcine	Swab	175	NVSL, CAHFS-Davis	All positive for SVA
	Vesicular Stomatitis Virus (VSV)	Equine	Swab, Serum	1	NVSL, CAHFS-Davis	Negative
	Screwworm Infestation	Avian	Swab	1	NVSL, CAHFS-Davis	Negative
	Rabbit Hemorrhagic Disease Virus Type2 (RHDV2)	Rabbit	Swab	4	NVSL, CAHFS-Davis	Negative
Ontario	RHDV2	Rabbit	Swab	25	NVSL, CAHFS-Davis	Positive among wild rabbit population
Redding	FMD, SVA	Porcine	Swab	2	NVSL, CAHFS-Davis	All positive for SVA
	African Swine Fever (ASF)	Porcine	Swab	1	NVSL, CAHFS-Davis	Negative
	FMD, VSV, Botulism	Bovine	Swab	2	NVSL, CAHFS-Davis	Negative
	virulent Newcastle Disease (vND), Avian Influenza (AI)	Avian	Swab	1	NVSL, CAHFS-Davis	Negative
	Vesicular Stomatitis Virus (VSV)	Equine	Swab	3	NVSL, CAHFS-Davis	Negative
	RHDV2	Rabbit	Swab	1	NVSL, CAHFS-Davis	Negative
Tulare	FMD, SVA	Porcine	Swab	13	NVSL, CAHFS-Davis	All positive for SVA
	ASF	Porcine	Swab	1	NVSL, CAHFS-Tulare	Negative
	FMD, VSV, Toxicity	Bovine	Swab	3	NVSL, CAHFS-Davis	Negative
	FMD, VSV	Caprine	Swab	1	NVSL, CAHFS-Davis	Negative
	RHDV2	Rabbit	Swab	1	NVSL, CAHFS-Davis	Negative

\*NVSL: National Veterinary Services Laboratory, CAHFS-Davis California Animal Health and Food Safety Laboratory, Davis

## West Nile Virus 2020 Updates

By: Emily Nietrzeba, DVM, MPH

The first 2020 case of equine West Nile Virus (WNV) in California has been confirmed in Amador County. A 20-year-old Quarter Horse gelding displaying acute severe neurological signs with unknown vaccination history was confirmed positive for WNV on June 26, 2020. The gelding is currently alive.

West Nile Virus is the leading cause of arthropod-borne encephalitis (brain inflammation) in horses and humans in the United States, with horses representing 96.9% of all non-human mammalian cases. The virus is present in all 48 continental states, Mexico, and Canada, and is transmitted from avian reservoir hosts to mammals by a variety of



(Continued on page 4)

## West Nile Virus 2020 Updates - continued

mosquito species. It is important to remember that both humans and horses are considered dead-end hosts for WNV and the virus is not directly contagious from horse to horse or horse to human. WNV vaccination is considered a core vaccination by the American Association of Equine Practitioners and an essential standard of care for all horses in North America.

This is an excellent opportunity to remind friends and colleagues of the importance of developing and adhering to a protective vaccination program with their veterinarian, and to discuss vector control measures at home and on farm. In addition to minimizing equine (and human) exposure to mosquitoes during peak feeding periods of dawn and dusk and appropriate application of mosquito repellent, effective mosquito abatement recommendations include:

- Draining unnecessary standing water found in wheelbarrows, tires, etc.
- Cleaning water containers at least weekly (i.e., bird baths, plant saucers)
- Scheduling pasture irrigation to minimize standing water
- Keeping swimming pools optimally chlorinated and draining water from pool covers
- Stocking of water tanks with fish that consume mosquito larvae (Contact local mosquito control for assistance) or use mosquito “dunk” available at hardware stores.

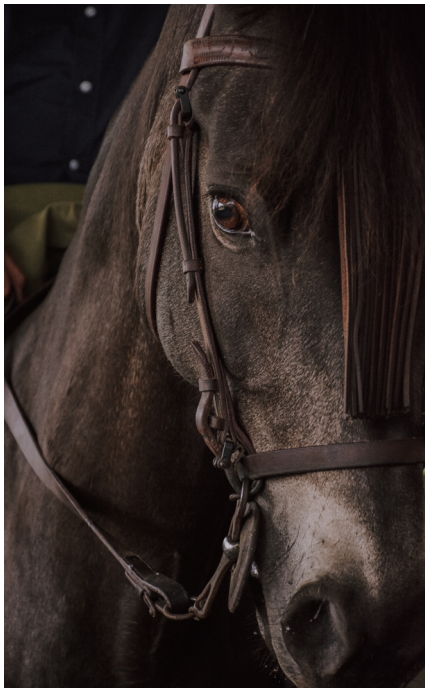
Additional information and updated alerts are available here:

[CDFA Equine West Nile Virus](#)

[CDPH West Nile Virus](#)

## Vesicular Stomatitis 2020 Updates

By: Emily Nietrzeba, DVM, MPH



Vesicular stomatitis (VS) is a viral infection that can affect horses, cattle, and pigs, and can also but rarely be seen in goats, sheep, and llamas. Disease manifestation of vesicular stomatitis is blister-like lesions commonly around the tongue, mouth, nose, and lips, but can also present around the coronary bands, udder, or sheath. Vesicular stomatitis is a reportable disease in most states, including California, not only because of rapid transmission but because clinical signs of this disease are identical to those caused by foot and mouth disease in cattle and swine, swine vesicular disease, and vesicular exanthema of swine.

VS transmission occurs via direct contact with sores of infected animals or vector-borne blood transmission. Known vectors for VS transmission include black flies, sand flies, and biting midges (*Culicoides spp.*), which have been implicated as the likely source of infection in most recent positive premises. Infected animals must be promptly isolated to reduce intra-herd transmission, and positive premises are quarantined for 14 days following the onset of lesions of the last affected animal. Biosecurity measures and vector mitigation efforts are frequently implemented on infected premises to reduce within-herd spread of the virus. No specific treatment for VS is indicated aside from supportive care, usually consisting of pain management and soft feeds in the presence of perioral lesions.

*(Continued on page 5)*

## Vesicular Stomatitis 2020 Updates - *continued*

The 2020 VS outbreak began on April 13, 2020, when the National Veterinary Services Laboratories (NVSL) in Ames, Iowa confirmed the first VS-positive premises in Dona Ana County, New Mexico. Arizona, Texas, Kansas, Nebraska, and Oklahoma subsequently broke with VS cases which were confirmed by NVSL on April 22, 2020 (Cochise County, Arizona, April 23, 2020 (Starr County, Texas), June 16, 2020 (Butler County, Kansas), June 24, 2020 (Buffalo County, Nebraska), and July 7, 2020 (Washington County, Oklahoma).

As of July 7, 2020, 122 VS-affected premises have been identified (92 confirmed positive, 30 suspect). One hundred fifteen (115) of these premises had only equine species clinically affected and four premises had clinically affected cattle (McMullen, Starr, and Zapata Counties, Texas). Arizona has identified 19 affected premises (18 confirmed positive, one suspect) in seven counties (Apache, Cochise, Gila, Maricopa, Pima, Pinal, and Santa Cruz Counties). Kansas has identified 74 affected premises (48 confirmed positive, 26 suspect) in seven counties (Butler, Cowley, Greenwood, Marion, Montgomery, Sedgwick, Sumner Counties). Nebraska has identified one affected premises in one county (Buffalo County). New Mexico has identified 16 affected premises (13 confirmed positive, three suspect) in six counties (Bernalillo, De Baca, Dona Ana, Eddy, Grant and Sierra Counties). Oklahoma has identified one affected premises (one confirmed positive) in one county (Washington County). Texas has identified 10 affected premises (10 confirmed positive, 0 suspect) in six counties (El Paso, Hudspeth, Kerr, McMullen, Starr, and Zapata Counties).

There have been a total of 68 previously VS-infected or suspect premises that have completed the quarantine period and been released. The last VS-quarantined premises was released in New Mexico on June 4, 2020 and in Texas on June 8, 2020. Fifty-four (54) premises remain under VS quarantine in Arizona, Kansas, Nebraska, and Oklahoma.

Both VS-Indiana (VS-IN) and VS-New Jersey (VS-NJ) serotypes have been identified during the 2020 outbreak. VS-IN occurred in the U.S. in 2019, while VS-NJ was last isolated in the U.S. in the 2014-2015 outbreak. Both serotypes are known to circulate in endemic cycles in southern Mexico. The last U.S. outbreak involving both serotypes occurred in 1997-1998.

For import into California, all horses, cattle, sheep, goat and swine originating from any state where vesicular stomatitis has been diagnosed (except cattle and swine transported directly to slaughter) must be accompanied by a health certificate (Certificate of Veterinary Inspection) signed by an accredited veterinarian that includes the following statement:

“I have examined all the animals identified on this certificate within **7 days of shipment date** and found them to be free from signs of Vesicular Stomatitis (VS). During the **last fourteen (14) days**, these animals have not been exposed to VS nor located on a VS confirmed or a VS suspected premises.”

### Special Note to Veterinary Practitioners:

Veterinarians suspicious of vesicular stomatitis lesions should immediately contact their local CDFA district office and/or USDA APHIS field office to report the case and receive guidance on sample collection (map and contact information on page 13). Initial sample collection and case reporting should be done by a Foreign Animal Disease Diagnostician (FADD)-trained veterinarian from CDFA or USDA. In the event an FADD veterinarian is unavailable or too far away to collect samples in a timely manner, a veterinarian from CDFA or USDA will provide forms and sampling instructions to the private practitioner, who should be a Category II accredited veterinarian. It is **imperative** that proper sampling of suspect cases, including collection of serum **and** swabs of lesions, be done according to USDA vesicular stomatitis field procedures in order to accurately diagnose this disease and protect the health of California's equine and livestock population. Additional specimen collection is required for swine and ruminant suspects, and veterinarians should contact their CDFA district office for additional information. CDFA sincerely appreciates the efforts and vigilance of its veterinarians to promptly detect and report foreign animal diseases and reportable conditions in the animal populations they serve.

(2020 national data provided by Dr. Angela Pelzel-McCluskey, USDA-APHIS-Veterinary Services)



## Free RFID Tags: Updates

By: Kelly Mammen, BS, Livestock Inspector

In line with the USDA's actions to increase the use of electronic animal identification, the Animal Health Branch began distributing free RFID ear tags, ear tag applicators, and wand readers to veterinarians in March 2020. California has been allotted 659,413 tags by the USDA and as of June 3 has received 70,000 white tags, 20,000 orange tags, 10 wand readers, 70 pocket readers, 200 Allflex tag applicators and 550 Datamars tag applicators. The delivery of these tags has unfortunately slowed due to COVID-19, however, the USDA warehouse has continued to slowly ship tags out and an additional 16 RFID wand readers are in process of being ordered. Veterinary practitioners may reach out to their district office staff to request RFID tags and wands.



## USDA Proposal to Transition to Electronic ID for Cattle Now Open for Public Comment

By: Rebecca Campagna, DVM, MPH

On July 6, 2020, the United States Department of Agriculture (USDA) published a proposed rule in the Federal Register regarding a transition to electronic ID (RFID tags) for cattle currently covered by federal animal disease traceability (ADT) regulations. According to the rule, official eartags for cattle and bison would need to be electronic starting January 1, 2023, but metal clip eartags already in place at that time would be considered official for the life of the animal. The notice can be found on the Federal Register's website: <https://www.federalregister.gov/>. We encourage all stakeholders to review the proposed rule and provide comments. The comment period will close on October 5, 2020.

## Compliance and Enforcement of Dairy Identification

By: Angelina Velez, AAS



We are distributing a dairy identification enforcement letter via direct mailings and handouts by district field personnel, to all dairy producers and calf transporters. This letter is to provide notice of implementation of an enforcement action policy for official identification (ID) requirements for intrastate movement of dairy cattle in order to regain necessary compliance of state regulations.

**The letter states that beginning August 1, 2020, Notices of Violation (NOV) will be issued to dairy owners who fail to tag their calves prior to leaving the dairy. In addition, calf haulers or other on-dairy purchasers moving calves that are not identified with tags from the dairy of origin, will be issued an NOV. Subsequently, anyone who continues to not comply with state requirements for official identification of dairy cattle is in violation of state laws and regulations and will be issued a citation. Citations carry a criminal charge equivalent to a misdemeanor and upon conviction are punishable by a fine determined by the court, in accordance with Food and Agricultural Code Section 9165. Please note that misdemeanor convictions will show up on your record.**

Pursuant to Section 831.5 of Title 3 of the California Code of Regulations, as of April 1, 2017, dairy cattle **moving within** California are required by law to have official ID. Dairy cattle born in California after January 1, 2017 must have official ID prior to leaving their birth premises and all dairy cattle, regardless of birth year, must have official ID at the

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## Compliance and Enforcement of Dairy Identification - continued

time of change of ownership.

Dairy cattle are exempt from this requirement if they are moving:

- Directly to slaughter, or;
- Directly to an "Approved Tagging Site" (ATS) where they are identified upon arrival on behalf of their owner. Calf haulers are **not** ATS's.

Please contact your local CDFA Animal Health Branch (AHB) district office with any questions. You can obtain free official ID (silver brite and RFID) ear tags from your accredited veterinarian and from local AHB district offices.

Sacramento Headquarters: **916-900-5002**

Redding: **530-225-2140** Modesto: **209-491-9350**

Tulare: **559-685-3500** Ontario: **909-947-4462**

We thank all those who are currently in compliance with this regulation for your continued cooperation and support of animal disease traceability in California.

## AgView African Swine Fever Exercise

By: Lisa Quiroz, AHB Emergency Preparedness and Response Section

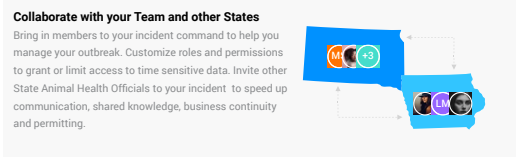
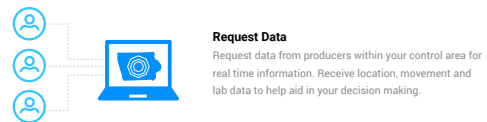
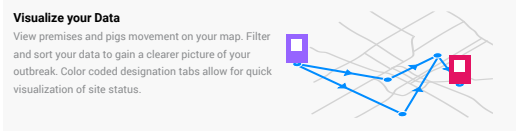
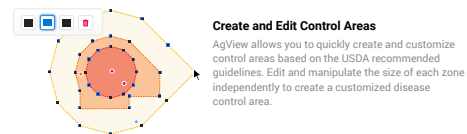
On June 24th, approximately thirty (30) CDFA AHB personnel participated in an AgView exercise hosted by the National Pork Board. AgView is an online password-protected platform that enables animal health officials, industry and other stakeholders to visualize and manage animal disease outbreaks, with capabilities for sharing industry data real-time, enabling regulatory officials to use the data to make timely response decisions.

The exercise focused on a simulated African Swine Fever outbreak in the U.S. with animal movements between the affected state, Utah, and California. During the exercise, both the California and Utah State Veterinarians were able to activate incidents using AgView, draw control areas on the platform's integrated map, share the map with industry and all response personnel, request and review industry data, and collaborate with colleagues from outside their state.

The AgView platform provides unique capabilities for sharing data, maps, and control areas with affected industry and amongst and between state animal health officials. While California uses the USDA Emergency Management Response System (EMRS) as the official database of record for any foreign animal disease response, exercise participants saw value in the AgView platform for sharing critical incident information with affected producers and animal health officials from other states. The National Pork Board plans to continue development of the AgView platform, adding additional capabilities, with an initial version release date scheduled for fall 2020. Directly following the exercise, participants were invited to provide comments and suggestions related to the Ag View functionality. This feedback will help to inform future improvements.

### Welcome to AgView

Empowering better animal health decisions with technology



## Introducing CAHEN Welcome to the “Hen House”

By: Dr. Alexi Haack, DVM



We start this story in the year 2018, when virulent Newcastle Disease (vND) invaded and devastated the southern California poultry landscape. Even with an alliance of two powerhouses, CDFA and USDA, the battle with our invisible foe spanned two long and exhausting years. Out of the rubble of vND emerged a new fighter: California Avian Health Education Network, otherwise known as CAHEN.

CAHEN has four main goals to protect southern California poultry owners from future devastation. *First*, provide educational materials and outreach on avian health to the poultry community. *Second*, prevent a future foreign animal disease (FAD) by encouraging awareness and participation in disease reporting and investigation. *Third*, prevent animal disease spread through implementation of biosecurity measures. And *finally*, to rapidly detect, respond, and eradicate a future outbreak.

To address the first three goals CAHEN is currently directing efforts to high-risk flocks by creating quality assurance programs for retail feed and pet stores as well as game bird and backyard poultry hobbyists. We are additionally cultivating relationships with youth groups, encouraging backyard owners to utilize California Animal Health and Food Safety Laboratory, and working hand in hand with animal shelters, control, and enforcement groups. Despite the added difficulties of outreach in the time of COVID restrictions, we are receiving numerous requests for our services and are rapidly developing online biosecurity training and outreach tools to share with our communities. Check out our Instagram (CAHENET) for the new weekly post for #FowlFactFriday!

To address the daunting fourth goal of detection, response, and eradication, we expand and complement the current avian health program by increasing their avian influenza outreach and surveillance in addition to growing a large pool of voluntary vND testing participants. You can find us sampling now at Live Bird Markets, auctions, swapmeets, commercial and independent farms, game fowl and hobby backyards, and feed and pet stores. In just our first month of action, that effort collected over 400 vND negative samples!

We are rapidly developing at the “Hen House” and look forward to connecting with our poultry loving communities and especially our fellow CDFA flocks.

If you have any questions, the top of CAHEN’s pecking order is Dr. Ann Ikelman and our flock can be reached at: [CDFA.AHFSS\\_CAHEN@cdfa.ca.gov](mailto:CDFA.AHFSS_CAHEN@cdfa.ca.gov).

## Antimicrobial Use and Stewardship Checklist

By: Antimicrobial Use and Stewardship Program

The “Antimicrobial Stewardship Planning Checklist” is designed to help veterinarians discuss antimicrobial use and animal husbandry stewardship with livestock producers.

The five stewardship categories are as follows:

- Records & Planning
- Daily Farm Management/ Biosecurity
- Premise Considerations
- Treatment Progressions
- Maximizing Your Veterinarian’s Expertise



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## Antimicrobial Use and Stewardship Checklist - *continued*

Veterinarians and producers may find this checklist useful when designing and implementing on-farm animal health plans and best management practices. Two different formats are available for the document, each containing identical text. The double-sided simple checklist [tool](#) is useful as a quick guide during routine farm health checks, and the 9-page [worksheet](#) provides additional space for notes and discussion.

Use of these resources is your choice; they may help facilitate and maintain a veterinarian-client-patient relationship. To download these documents for printing and use virtually, please visit our “Stewardship” page, under Animal Health and Disease prevention at <https://www.cdfa.ca.gov/AHFSS/aus/Stewardship.html>.

## Partnering for Dairy Antimicrobial Stewardship: A Conference for Farmers and Veterinarians of the West

By: Antimicrobial Use and Stewardship Program

The event organizers have moved to a webinar series. The program provides veterinarians up to 7 ½ units of continuing education credit, sponsored by CDFA's Antimicrobial Stewardship Program, the Washington State University's Veterinary Medical Education, and funded by the FDA. Producers will be provided tools to discuss with their veterinarians how to best implement antimicrobial stewardship on their farms.



Although the four evenings complement each other, participants may register for one day or the three remaining sessions of the whole series below. Each meeting is two hours long, from 6 to 8 pm.

July 15: Register [here](#).

July 22: Register [here](#).

July 29: Register [here](#).

For more information and further updates, visit our partner's website: <https://vetextension.wsu.edu/dairy-antimicrobial-stewardship/>

We thank you for your support and look forward to providing you these informative webinars.

## SARS-CoV-2 (Causative Agent for Human COVID-19) Testing in Animals

By: Rebecca Campagna, DVM, MPH

The California Department of Food and Agriculture (CDFA) and California Department of Public Health (CDPH) have developed a guidance document for the testing of pets, livestock, and other animals for SARS-CoV-2, the viral agent of the COVID-19 outbreak. This document describes procedures and criteria for testing animals and is intended to guide veterinarians considering SARS-CoV-2 infection in patients. These protocols are consistent with the positions of the United States Department of Agriculture (USDA), the U.S. Centers for Disease Control and Prevention (CDC), and the American Veterinary Medical Association (AVMA). At this time, the available empirical evidence does not support animals as a source of SARS-CoV-2 infection for humans. Routine testing of animals for SARS-CoV-2 is

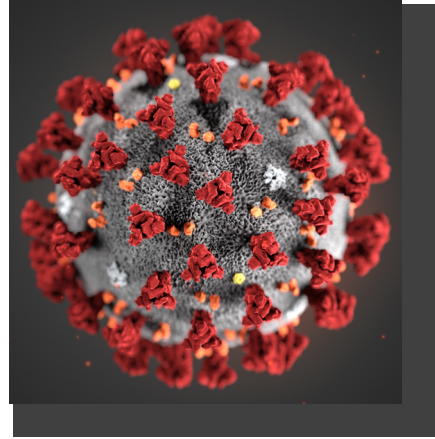
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## SARS-CoV-2 (Causative Agent for Human COVID-19) Testing in Animals - continued

not informative or recommended, and testing should be conducted only under specified circumstances, as described in the guidance document. Veterinarians considering testing patients for SARS-CoV-2 are encouraged to contact their local health department for consultation. Questions may also be directed to the following email address: [CDFA.AHFSS\\_COVID19\\_Animal\\_Testing@cdfa.ca.gov](mailto:CDFA.AHFSS_COVID19_Animal_Testing@cdfa.ca.gov). Presumptive positives for SARS-CoV-2 in animals must be confirmed by USDA's National Veterinary Services Laboratories (NVSL). Any presumptive positive test results from academic, private, or other commercial laboratories must be reported by laboratories or submitting veterinarians to [CDFA.AHFSS\\_COVID19\\_Animal\\_Testing@cdfa.ca.gov](mailto:CDFA.AHFSS_COVID19_Animal_Testing@cdfa.ca.gov) within one (1) working day to arrange for confirmatory testing.

The guidance document and links to resources can be found on [CDPH's website](#).

The CDC has also prepared a document entitled "What You Need to Know About COVID-19 and Pets" that provides information on clinical signs and testing in animals, what to do if an owner thinks their pet is sick, and guidance for owners who test positive for COVID-19. The document can be found on CDC's website: <https://www.cdc.gov/coronavirus/2019-ncov/downloads/covid-19-pets-prevention.pdf>



## Rabbit Hemorrhagic Disease

By: Andrea Mikolon, DVM, MPVM, PhD



Rabbit Hemorrhagic Disease (RHD) is a caliciviral disease of lagomorphs, including rabbits and hares. It is possible that pikas (family Ochonotidae) are also susceptible. RHD does not affect other animal species or humans. In rabbits, RHD causes severe hepatitis which often results in massive internal hemorrhaging. Clinical signs include sudden death, fever, icterus, and bleeding from the nose or other body orifices. It can also cause inappetence, lethargy, spasms, and difficulty breathing. There is no treatment for RHD. The incubation period ranges from one to nine days. RHD can be caused by two related viruses, Rabbit Hemorrhagic Disease Virus serotype 1 (RHDV1) which affects only domestic and wild European rabbits of the genus *Oryctolagus*, and Rabbit Hemorrhagic Disease Virus serotype 2 (RHDV2) which appears to be able to affect all

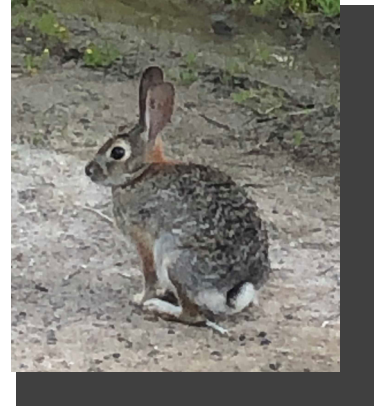
species of rabbits and hares. There have been cases of RHDV2 in the northern United States starting in 2018. Since detected in New Mexico in March 2020, a strain of RHDV2 has been spreading across the southwestern United States and northern Mexico, affecting both wild and domestic rabbits and hares. It has spread rapidly through wild populations. In the current outbreak, the fatality rate has been ranging from about 40 to 90% and it is affecting all ages of rabbits. Rabbits which survive often have liver impairment and may shed virus for two months or longer in their secretions.

In early May 2020, RHDV2 was detected in a wild black-tailed jackrabbit in Riverside County, near Palm Springs in

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## Rabbit Hemorrhagic Disease - continued

Riverside County. Since then it has been detected in wild black-tailed jackrabbits and cottontail rabbit near Joshua Tree National Park in San Bernardino County and in wild cottontail rabbits in San Diego and Orange Counties. Good biosecurity practices are critical for prevention of RHD. Rabbits should be kept indoors if possible and ensure that domestic rabbits have no direct or indirect contact with wild rabbits and hares. Movements of wild and domestic rabbits may be playing a role in the spread of this outbreak. In addition to spread by direct contact with infected rabbits and their secretions, the virus can be spread by indirect contact with shoes, clothing or inanimate objects. Humans, dogs, coyotes, rodents, and insects can move the virus around. The virus is very resistant and remains viable in the environment for up to 105 days. It also can be maintained in chilled or frozen rabbit meat, which has been implicated in some outbreaks. Carcasses should be disposed of by incineration or deep burial (double bagged, three feet deep), if permitted by the municipality. They should be double-bagged in plastic and the outer bag sprayed with disinfectant if sent to landfill. USDA recommends 10% bleach or 1% Virkon-S for disinfection of surfaces.



There is no licensed vaccine for RHD available in the United States. Veterinarians licensed in the state of California can apply to the state veterinarian for approval to request a permit from the USDA's Center for Veterinary Biologics to import vaccine from Europe. Please email us at [ahbfeedback@cdfa.ca.gov](mailto:ahbfeedback@cdfa.ca.gov) for information on importing RHD vaccine.

We encourage rabbit owners to submit dead domestic rabbits to the California Animal Health & Food Safety Laboratory (CAHFS). Owners should not attempt opening rabbit carcasses themselves because visual observation alone, even by a veterinary pathologist, is not diagnostic for this disease. Also, opening up carcasses may spread contamination and risk exposure of the owner to other diseases such as tularemia and plague which can cause acute rabbit deaths. Report suspicious deaths of domestic and feral domestic rabbits to the California Department of Food & Agriculture's Animal Health Branch at appropriate district office or CDFA HQ (See next page). Report suspicious deaths of wild rabbits and hares to the California Department of Fish & Wildlife.

For more information go to our website:

[https://www.cdfa.ca.gov/AHFSS/Animal\\_Health/Pets\\_Other\\_Un-Reg\\_Species.html#rhd](https://www.cdfa.ca.gov/AHFSS/Animal_Health/Pets_Other_Un-Reg_Species.html#rhd)

## 2020 U.S. Salmonella Outbreak: Cases Often Tied to Backyard Poultry

By: Elise Kishi Chad, DVM, MS

The Centers for Disease Control and Prevention (CDC) reports that as of June 23, 2020, a total of 465 people in 42 states have been identified as infected with one of the outbreak strains of Salmonella. Of those ill, 19 were in California and seven serotypes were identified. Many of these cases are associated with backyard poultry. Salmonella in backyard poultry cannot be completely removed so there is always some risk of human infection. There is also evidence that with the Covid-19 pandemic and more people at home there is an increase in backyard poultry ownership.

The good news is that there are specific steps that backyard poultry owners can follow. Through the years the CDC  
(Continued on page 12)

## 2020 U.S. Salmonella Outbreak: Cases Often tied to Backyard Poultry - continued

along with State and local health departments have investigated Salmonella infections and found a few factors regularly tied to infection:

1) Infection is often tied to *young* chicks or ducklings. These birds have just undergone the stress of hatching, have often traveled to new settings (feedstore, delivery through the mail, etc) and are therefore more likely to be shedding higher levels of a Salmonella.

### Steps that can mitigate risk:

- Provide the birds with fresh, clean water, dry bedding, appropriate feed & heat lamp. Good basic husbandry is good for the chicks/ducklings and they may shed less salmonella.
- Treat every chick/duckling like they are shedding salmonella and take appropriate precautions including washing hands before and after handling.

2) Children under five years of age are most likely to end up severely sick and in the hospital from an infection. These children are naturally more likely to put their hands in their mouths which makes getting Salmonella into them easier.

### Steps that can mitigate risk:

- Think of ways these young children can observe from a safe distance without interacting with birds.
- If they will interact with the chicks/ducklings, ensure very close adult supervision that stops them from kissing or nuzzling the birds and preventing children from putting their hands in their mouths.
- Always wash your hands and kids' hands after interacting with chicks/ducklings and see: [CDC](#)



**Advice to Mail-Order Hatcheries:** Provide health-related information to owners and potential purchasers before they buy any poultry. Learn more by clicking here: [CDC](#)

**Advice to Feedstores:** Place multi-lingual health information in clear view where poultry are displayed. Learn more by clicking here: [CDC](#)

**Be aware of the symptoms of Salmonella in humans:** Most people infected with Salmonella develop diarrhea, fever, and stomach cramps six hours to six days after being exposed to the bacteria. Learn more at [CDC Symptoms of Salmonella](#)



# Map of District and Other Locations

United States Department of Agriculture  
Animal and Plant Health Inspection Service (APHIS)

Animal Health & Food Safety Services  
Animal Health Branch

California Animal Health & Food  
Safety (CAHFS) Laboratory System

**SACRAMENTO HEADQUARTERS**

**Field Operations**

AVIC: Larry Rawson, DVM  
USDA/APHIS/VS  
10365 Old Placerville Rd., Suite 210  
Sacramento, CA 95827  
Telephone: (916) 854-3950  
FAX: (916) 363-3919

**SACRAMENTO HEADQUARTERS**

**Veterinary Export Trade Services (VETS):**

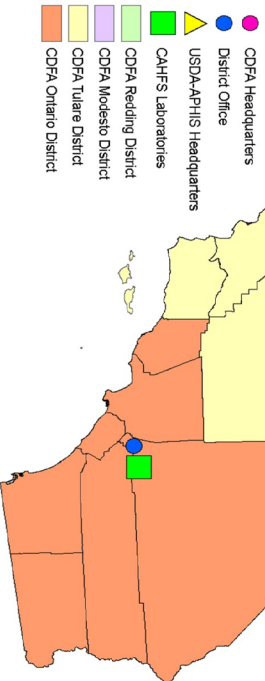
National Import and Export Service Center  
Director: David Ewey, DVM, MPVM  
USDA/APHIS/VS  
10365 Old Placerville Rd., Suite 210  
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**PORT OF LOS ANGELES**

Port Director: Tremon Bell, DVM  
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Los Angeles Animal Import Center  
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El Segundo, CA 90245  
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**SAN FRANCISCO**

Port Veterinarian: Katharine Stanzel, DVM  
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FAX: (650) 876-0915  
[http://www.aphis.usda.gov/animal\\_health](http://www.aphis.usda.gov/animal_health)



- CDFA Headquarters
- District Office
- ▲ USDA-APHIS Headquarters
- CAHFS Laboratories
- CDFA Redding District
- CDFA Modesto District
- CDFA Tulare District
- CDFA Ontario District

**SACRAMENTO HEADQUARTERS**

Chief: Kent Fowler, DVM  
CDFA-Animal Health Branch  
1220 N St.  
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Telephone: (916) 900-5002  
FAX: (916) 900-5333

**CENTRAL DAVIS LABORATORY**

**Co-Directors:**

John Adaska, MPVM, PhD  
Beate Crossley, DVM, MPVM, PhD  
Ashley Hill, DVM, MPVM  
University of California  
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**REDDING DISTRICT**

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**TURLOCK LABORATORY**

Chief: Simone Stout, DVM, PhD  
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Turlock, CA 95381  
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**MODESTO DISTRICT**

VIC: Randy Anderson, DVM, MPVM  
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FAX: (209) 491-9353

**TULARE LABORATORY**

Chief: John Adaska, MPVM, PhD  
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Tulare, CA 93274  
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FAX: (559) 688-2985

**TULARE DISTRICT**

VIC: Gregory Ledbetter, DVM, MPVM  
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FAX: (559) 685-3503

**ONTARIO DISTRICT**

VIC: Alisha Ohnstead, DVM  
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FAX: (909) 923-5128  
<http://www.cdffa.ca.gov/ah>



<https://cahfs.vetmed.ucdavis.edu/>





## Staff Biographies

**Dr. Charlene Rivera Barrera** is originally from Bayamón, Puerto Rico. She completed her undergraduate studies at the University of Puerto Rico in Rio Piedras, PR, and her veterinary degree at Tuskegee University in Tuskegee, AL.

After graduation, she went on to complete a rotating internship in small animal medicine and surgery in Westbury, NY. For the past six years, she has worked as a small animal practitioner with a special interest in avian and exotic animal medicine, and public health.

She enjoys spending time traveling and outdoors with her partner and dog. Dr. Rivera joined the Animal Health Branch, Ontario district in May 2020, and is currently working with the CAHEN program.

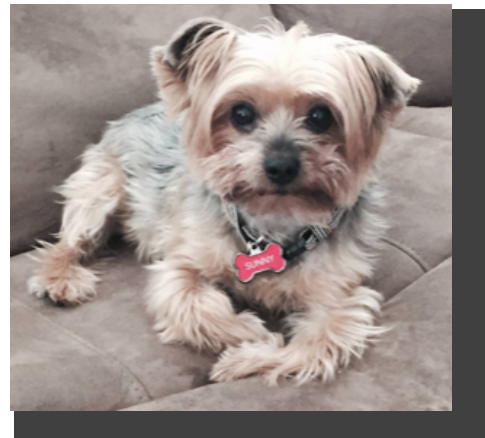


**Angelina Velez** joined the CDFA in May 2020 as an Associate Governmental Program Analyst in the Animal Health Branch. She first began her state service when she worked for the CDFA as a Seasonal Agricultural Aide on the task force in Southern California for the eradication of Newcastle Disease in 2003. During her time on the task force she worked in a multi-role position as Assistant to the CDFA Area Commander and as the Quarantine Appeals Coordinator. Angelina moved back to Sacramento and came back to work for CDFA as an Office Technician for the Bureau of Livestock Identification. She went on to complete an Associates program and earned a degree in Paralegal Studies. She worked as a Legal Secretary in the Legal Office for both the Department of Insurance and Social Services. She eventually promoted to a Paralegal position in the Legal Office with the Department of Health Care Services. After just short of eight years of state service, Angelina decided to pursue

a position in the private sector and worked as a Senior Fiber Design Engineer and Project Manager for the last seven years.

Angelina is a proud mother of two amazing little kids (and one cute pup Sunny!), her daughter Karissa who's six and son Isaiah who's one. They keep her pretty busy, home life is never quiet! When she manages to have to time, enjoys reading a good book and doing anything creative.

She is very excited to be back with the CDFA and looking forward to making a contribution to the Animal Health Branch team!



# Contact Information



CALIFORNIA DEPARTMENT OF  
FOOD & AGRICULTURE

California Department of Food and Agriculture  
Animal Health and Food Safety Services  
Animal Health Branch  
1220 N Street  
Sacramento, CA 95814

*Physical Address:*  
2800 Gateway Oaks Drive  
Sacramento, CA 95833

Website: [www.cdfa.ca.gov/ahfss/Animal\\_Health/Index.html](http://www.cdfa.ca.gov/ahfss/Animal_Health/Index.html)  
Email: [ahbfeedback@cdfa.ca.gov](mailto:ahbfeedback@cdfa.ca.gov)

## Animal Health Branch

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Fax: (916) 900-5333  
Permit Line: (916) 900-5052

## State Veterinarian and Director, Animal Health and Food Safety Services

Dr. Annette Jones  
(916) 900-5000

## District Offices Veterinarian In Charge (VIC)

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(530) 225-2140

Modesto: Dr. Randy Anderson  
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Modesto, California 95358  
(209) 491-9350

Tulare: Dr. Gregory Ledbetter  
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Tulare, California 93274  
(559) 685-3500

Ontario: Dr. Alisha Olmstead  
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Ontario, California 91761  
(909) 947-5932

## Other AHFSS Branches

Bureau of Livestock Identification  
John Suther, Chief  
(916) 900-5006

Milk and Dairy Food Safety  
Dr. Stephen Beam, Chief  
(916) 900-5008

Meat, Poultry and Egg Safety  
Paula Batarseh, Chief  
(916) 900-5004

Antimicrobial Use and Stewardship  
Dr. Dennis Wilson, Chief  
(916) 576-0300

## United States Department of Agriculture

Dr. Donald Herriott  
District Director, District 3

Dr. Larry Rawson  
Assistant District Director, District 3 (CA/HI)

USDA, APHIS, VS, SPRS  
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