

CFC 2020 Approves LDA as National Charity

The LDA has been designated as a **national** charity included in the 2020 Combined Federal Campaign (CFC) Charity List. CFC is part of the Office of Personnel Management (OPM). Each year, federal employees are provided with lists of approved charities for their workplace giving through the CFC. The LDA has met the requirements and been a part of CFC for 15 years running. LDA's administrative and fundraising costs were determined to be only 2.7% for 2019, meaning 97.3% went directly to programs.



The LDA's CFC 2020 identification for donors is #11424, and the Lyme Disease Association, Inc. will appear in the listing of National/International Independent Organizations, which is published in each local campaign charity list. See your federal employer for details. Check the CFC website at: <http://www.opm.gov/cfc/> for details about the Combined Federal Campaign.

Thanks to all those volunteers who have helped with our programs nationwide, and a special thanks to those who have been contributing through their federal workplace CFC to the Lyme Disease Association, Inc.

New Tick Repellent Ingredient Registered by EPA



On July 20, 2020, the Environmental Protection Agency (EPA) registered a new active ingredient called nootkatone, which repels and kill ticks, mosquitoes, and other pests including bed bugs, and fleas. The Center for Disease Control (CDC) discovered and developed the new ingredient, a non-toxic chemical found in Alaska yellow cedar trees and grapefruit skin in minute amounts. Nootkatone smells and tastes like grapefruit, and is used in the fragrance industry for perfumes and food industry for flavoring. It can be used on humans and pets.

Nootkatone apparently kills bugs differently than previous classes of insecticides, including pyrethroids, organophosphates, carbamates, and cyclodienes. Since it is a new chemical – the first insecticide approved in 11 years – it can kill bugs that are resistant to currently available pesticides. It lasts on skin and clothing for several hours.

CDC's exclusively licensed partner, Evolva, and HHS Biomedical Advanced Research Development Authority were crucial to nootkatone development. Evolva can produce large amounts of nootkatone for low-cost, as it takes several tons of grapefruit to produce 2.2 lbs of nootkatone.

Dr. Brian Fallon, director of the Lyme and Tick-Borne Diseases

Research Center at Columbia University in New York City, said of nootkatone, "I think it's a major contribution to our arsenal of repellents."(nbcnews.com)

Tick-borne diseases represent almost 80 percent of reported vector-borne disease cases in the U.S. Reported cases of vector-borne diseases doubled from 2004 to 2018. Companies interested to develop brand name products will be required to submit a registration package to EPA for review, and products could be available in stores as early as 2022.

Current ingredients registered by the EPA as skin-applied insect repellents include Catnip oil, Oil of citronella, DEET, IR 3535, p-Methane-3,8-diol (pmd), Oil of lemon eucalyptus, Picardin, 2-undecanone, and now nootkatone.

LDA's Tick-Insect Repellents: Check the Facts

LDA's TBD & Prevention Page

CDC Press release

CDC Digital Press Kit

NY Times: Citrus Flavoring Is Weaponized Against Insect-Borne Diseases

Nbcnews.com: First new insect repellent approved in 11 years smells like grapefruit

SFTS Virus Outbreak in China from Ticks



Longhorned Ticks.
Photo by James
Occi, (PhD cand.)
LDA Scientific &
Professional
Advisory Board

Severe Fever with Thrombocytopenia Syndrome (SFTS) cases first appeared in April 2020 in China and since then, 37 more cases have occurred in Jiangsu and 23 in Anhui Provinces in China. SFTS is a haemorrhagic fever transmitted by the *Haemaphysalis longicornis* tick (Asian longhorned tick). The disease spreads rapidly and has a high fatality rate so is of high concern to the World Health Organization (WHO). SFTS is a Phlebovirus.

Experts are now indicating possible transmission from humans via blood, the respiratory tract, and wounds and from infected animals to humans.

According to CDC, Emerging Infectious Diseases, outbreaks have been reported in China in 2009 and in S. Korea in 2012. See https://wwwnc.cdc.gov/eid/article/24/11/17-0756_article

Another Phlebovirus, Heartland virus, is found in the US. It is apparently transmitted by the lone star tick and is most similar to the SFTS virus. The Asian longhorned tick, which is transmitting SFTS virus in Asia, is found in the US in 12

states.

Novel bunyavirus re-emerges in China – News.com.au

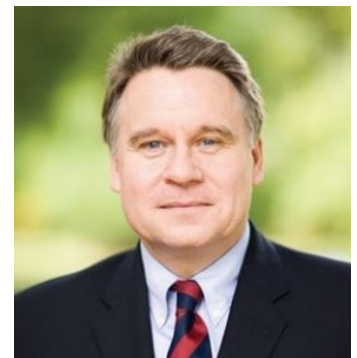
Tick-borne bunyavirus causing fever, hemorrhages spreading in China: Everything we know so far – Firstpost.com

Asian Longhorned Tick Continues to Multiply, Can transmit to Animals in the Lab – LDA website

Heartland virus disease – CDC website

House Approves Chris Smith Amendment Increasing Lyme Research by \$4M

News from Congressman Chris Smith website:



Congressman Chris Smith

The House of Representatives passed an amendment authored by Rep. Chris Smith (R-NJ) which increases Lyme disease research funding by \$4 million, for a total of \$20 million, at the Centers for Disease Control and Prevention (CDC) for fiscal

year 2021. The amendment, which passed July 30th, has been co-sponsored by lead Democrat, Rep. Collin Peterson (MN), and Reps. Elise Stefanik (R-NY), Antonio Delgado (D-NY), Max Rose (D-NY), and Raul Grijalva (D-AZ).

Rep. Smith said, “Just three years ago CDC’s Lyme budget was only \$11.7 million. The increase in funding achieved through my amendment will help CDC develop better diagnostic tests for Lyme, expand tick surveillance activities across the US and strengthen the federal government’s overall strategy to combat Lyme.”

In the news release, Pat Smith, LDA President was quoted: “Rep. Smith’s funding amendment is an important step in the fight to reign in Lyme disease. The rising case numbers and increasing spread of tick-borne diseases are alarming and require a sustained focus from Congress to try to control this epidemic. We are grateful to Congressman Smith for his continued dedication to this effort and his success along with his colleagues to acquire an additional \$4M in funding for Lyme disease and other tick-borne diseases. In these difficult times for our country, that is an outstanding accomplishment.”

Earlier in July, the House agreed to another Smith Lyme Disease amendment to mandate a GAO investigation into possible use of ticks in a Department of Defense bioweapons program.

[Read more on LDA website](#)

Rep. Smith introduced the House version of the recently enacted law, the *TICK Act* (*Ticks: Identify, Control, Knockout Act*—HR 3073), which implements a national strategy to fight Lyme disease and authorizes an additional \$150 million to increase funding for Lyme research, prevention and treatment programs. Senator Susan Collins (ME) had introduced the Senate version. **[Read more on LDA website](#)**

[Read Rep. Chris Smith’s full news release here](#)

[Read history of the amendment on LDA website](#)

**Co-Chair: "Persistent Lyme
Religious Belief"/Lyme \$\$\$
Amendments/ Tick Biowarfare
Investigation Passes
House/WNBA Denies Lyme-Covid
Exemption/LDA's New Spanish
LymeR Primer/Lyme Vaccine
Phase 2 Results/Asian
Longhorned Tick Increases**

**Asian Longhorned Tick
Continues to Multiply, Can**

transmit to Animals in the Lab



Longhorned Ticks. Photo by James Occi, (PhD cand.) LDA Scientific & Professional Advisory Board

These pictures of the *Haemaphysalis longicornis* (Asian longhorned) were taken recently by LDA's Scientific & Professional Advisory Board member James L. Occi, Rutgers, in Bergen County NJ. The invasive tick was first discovered on a NJ farm on a sheep in 2017. The tick probably came from Asia, where it is able to transmit diseases to cattle, other animals, and to humans and is now found in 12 states. One of the greatest concerns is about its parthenogenetic ability, the female reproduces without the male. This enables the tick to quickly become an established species in an area. It has already killed cattle in a couple states where more than a thousand ticks were found on each of the deceased animals.



To date, the Asian longhorned tick has been found in the laboratory to be able to acquire and transmit *Rickettsia rickettsii*, the agent of Rocky Mountain spotted fever (RMSF) and was also found to be able to transmit *R. rickettsii* through the ova (Stanley et al, 2020).* The Asian longhorned tick has not been found to transmit to humans outside the lab at this time in North America.

However, we need to be cautious, since until several years ago, the government indicated that brown dog ticks only fed upon dogs, not people. Therefore humans did not have to worry about getting RMSF from a brown dog tick. Now we know that human transmission is happening from the brown dog tick, since we know they are biting humans, especially in the Southwest.

*<https://academic.oup.com/jme/article/doi/10.1093/jme/tjaa076/5822589>

<https://lymediseaseassociation.org/news/experts-say-new-tbd-sp-read-by-asian-longhorned-tick-threatens-va-cattle/>

Occi, J. L., A. M. Egizi, R. G. Robbins, and D. M. Fonseca. 2019. Annotated List of the Hard Ticks (Acari: Ixodida: Ixodidae) of New Jersey. *J. Med. Entomol.* 56: 589–598.

<https://onlinelibrary.wiley.com/doi/abs/10.1111/zph.12743>

Series of Amendments Go

Through Process to Increase Lyme/TBD CDC \$\$\$



Congressman
Christopher H.
Smith (NJ-4)

In a complex government process, the Tick Act—a bill that provides funding for Vector-Borne Diseases including Lyme— was not fully funded according to the Committee report on HHS. The Committee report has 16M for Lyme and 38M for vector-borne diseases.

(NOTE: as LDA has mentioned in prior information on the Tick Act, it is for Vector-Borne Diseases of which TBD are only a part).

To address the issue, Congressman Chris Smith (NJ-4) developed an amendment to raise that funding for TBD, which was co-sponsored by Congressman Collin Peterson (MN). During amendment development, the President's budget request for 2021 was examined, which asked for \$14 million increase over 2020 for vector-borne diseases. Suggested funding levels in the Tick Act for vector-borne diseases were also examined. The LDA provided input into that amendment process and concurred with an additional \$11.4M to be asked for on top of the \$2M increase in appropriations asked for in the report. Congressmen Smith and Peterson submitted the amendment for \$11.4M, but Congressman Delgado (NY) also submitted an

amendment, asking for \$4M. The Congressmen agreed on \$4M in an amendment Smith et al # 289.

Amendment # 289. Smith, Christopher (NJ), Peterson (MN), Stefanik (NY), Delgado (NY), Rose, Max (NY) does the following: Redirects \$4 million from General Departmental Management at the Department of Health and Human Services to Emerging Zoonotic and Infectious Diseases at the Centers for Disease Control, for Lyme Disease and other Vector-Borne Diseases.

House Report 116-461, the Rules Committee Report on HR 7167, with amendments made in order, including the Chris Smith amendment. A description of the Smith amendment (289) is on page 33 of the pdf, and the actual language is on page 365 of the pdf.

Listen to the video below of Congressman Smith pitching the amendment to the committee.

Lyme Disease Treatment Guidelines



Clinical practice treatment guidelines are often used as reference by physicians for Lyme disease treatment and treatment of other tick-borne diseases. The LDA provides some links here for informational purposes only, as LDA does not make specific treatment recommendations.

The only Lyme disease treatment guidelines that that were posted on the National Guidelines Clearinghouse (NGC), under the auspices of the US Department of Health & Human Services, are those adhering to newly revised National Academy of Medicine (NAM), formerly the Institute of Medicine (IOM), standards for guidelines: the International Lyme & Associated Diseases Society (ILADS) Lyme Guidelines, which address usefulness of antibiotic prophylaxis for tick bite, effectiveness of EM treatment, and antibiotics' role in treatment of persistent Lyme disease symptoms. ***Note: Funding to support AHRQ's NGC contract ended on July 16, 2018. View update here.***

You can also checkout our handy infographic for treatment guidelines.

ILADS Guidelines for the Management of Lyme Disease

ILADS press release on the new guidelines

You can also review Chronic Lyme Disease: An Evidence-Based Definition by the ILADS Working Group

Other Lyme treatment guidelines of note are those developed by

one of the most recognized pioneers in Lyme treatment, Dr. Joseph Burrascano, now retired as a treating physician.

Link: Burrascano Diagnostic Hints & Guidelines* (16th edition, 10/2008)

Primary care physicians and other healthcare providers seeking continuing medical education (CME) credits for Lyme disease diagnosis and treatment can now approach the non-profit Partnership for Tick-Borne Diseases Education (PTDE) led by Elizabeth Maloney, MD, a physician with longstanding experience in speaking about tick-borne diseases, organizing Lyme disease conferences, and co-authoring treatment guidelines on Lyme and other tick-borne diseases.

Partnership for Tick-Borne Diseases Education, CME for Doctors

*In order to download this file, you will need Adobe Acrobat Reader 5.0 or greater. Please feel free to download the latest version for FREE.

How CDC Surveillance Criteria Impact Lyme Treatment

The Centers for Disease Control & Prevention (CDC) has a case definition for Lyme disease which is developed by the Council of State & Territorial Epidemiologists (CSTE). This definition is meant to be used for **surveillance** purposes only, not for diagnosis. Surveillance is the collection, analysis and interpretation of data for public health, e.g., comparing case numbers in different states: In 2015, PA is number one in Lyme case numbers, NJ is number two, etc. Below, is the current case definition used for surveillance.

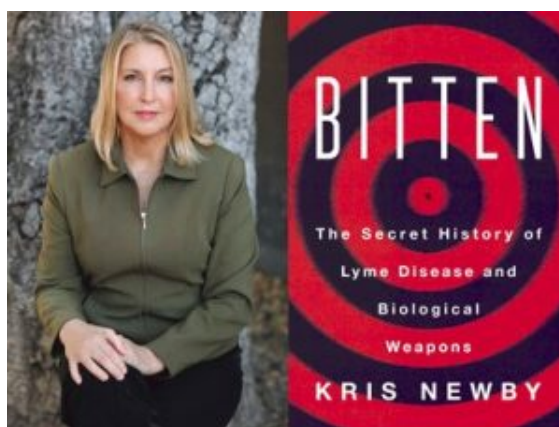
Depending upon what state you live in, surveillance reporting of cases might be mandatory. Some states require doctors to report cases that meet this surveillance criteria to the State, and some also require laboratories to report these Lyme cases or maybe only labs who do electronic reporting.

Doctors are not supposed to use the surveillance criteria to diagnose so Lyme treatment should not be based on surveillance criteria. Insurance companies should not base their payment on surveillance criteria.

[Click here: Lyme Disease | 2017 Case Definition](#)

DISCLAIMER: The LDA is not a medical organization. The LDA does not make specific recommendations for treatment. Whenever medical advice is needed, the services of a qualified medical provider should be sought. The guidelines on the web sites above are the products of the guidelines' authors who are solely responsible for their content.

GAO Investigation of Ticks/Vector-Borne Agents' Biowarfare Experiments Passes House



Kris Newby, Stanford University Science Writer, "Bitten"

Update July 29, 2020: The Bill and passed amendments such as this one (below) has now moved to the conference committee where the House and Senate will work to decide what language goes into the final product. The LDA provided input into the amendment language and has been working to get Senators to champion the inclusion of this GAO Investigation Amendment into the final bill.

Said LDA president Pat Smith: “We thank Congressmen Smith & Peterson for championing this investigation. Lyme and tick-borne diseases (TBD) patients and the public are entitled to know the truth about what past government research may reveal not only about the documented tick releases along the Atlantic bird flyway but also about research on the mysterious ‘Swiss agent’ which Dr. Willy Burgdorfer identified as a new Rickettsia strain in his work for the US Government– at Rocky Mountain Labs and in Switzerland. Perhaps it may uncover clues to help stop this epidemic of tick-borne diseases.”

Rep. Smith (NJ-04) NDAA FY 2021 Lyme Disease Amendment Floor Speech
Jul 21, 2020



Congressman
Christopher
H. Smith
(NJ-04)

July 23, 2020: The House voted this week to pass a number of amendments to the NDAA, National Defense Authorization Act, including a Chris Smith/Collin Peterson amendment, # 587 –The Comptroller General of the United States shall conduct a review of whether the Department of Defense experimented with ticks, other insects, airborne releases of tick-borne bacteria, viruses, pathogens, or any other tick-borne agents regarding use as a biological weapon between the years of 1950 and 1977. (<https://rules.house.gov/bill/116/hr-6395>).

There is information in various publications that such activities did occur, especially in the book “Bitten” by Kris Newby– a science writer at Stanford University–a book, which explores the evidence through actual government documents and interviews with some researchers who were involved that document such experiments.

Said LDA president Pat Smith: “Lyme and tick-borne diseases (TBD) patients and the public are entitled to know the truth about what past government research may reveal not only about the documented tick releases along the Atlantic bird flyway but also about research on the mysterious ‘Swiss agent’ which Dr. Willy Burgdorfer identified as a new *Rickettsia* strain in his work for the US Government– at Rocky Mountain Labs and in Switzerland. The book indicates there is speculation that this pathogen, if crossed with *Borrelia*, might well complicate treatment and thus be a candidate for biowarfare.” She added, “There is the possibility that any uncovered information could lead to facts which could shed light on the current epidemic of Lyme and other TBD and help develop solutions. We thank Congressmen Smith and Peterson for their continued push to make the truth known and the US House of Representatives for their vote to approve the amendment. ”

Some things author Newby revealed for the first time were: that ticks were developed and deployed as stealth biological weapons during the Cold War, and that Willy Burgdorfer, the scientist the Lyme bacteria, *Borrelia burgdorferi*, was named

after, was at the center of this program. According to Newby, specific revelations she makes in book include:

- A 1962 pilot study where infected ticks were dropped on Cuba sugar workers.
- Releases of hundreds of thousands of radioactive, aggressive Lone Star ticks on the Atlantic coastal bird flyway.
- Omissions of other microbes transmitted with Lyme-carrying ticks during the original outbreak ("Swiss Agent").
- Documentation of military studies where live disease-causing bacteria, some which can be spread by ticks, were sprayed from planes, boats and vehicles on the unsuspecting American public.

In 2019, a similar amendment was introduced and passed the House unanimously but there was no senate support for it.

The Lyme Disease Association (LDA) has been encouraging Lyme advocates across the country to contact both of their US Senators to champion and support this amendment. It is being heard in the Senate this week. LDA thanks those leaders who have made calls and sent emails to garner support.

More Information

New Jersey Globe: House passes Chris Smith measure to probe if government turned ticks into bioweapons

Chris Smith website: Chris Smith's Lyme Disease Amendment Passes House, Tells DOD IG to Investigate the 'Bioweaponization' of Ticks

NJ101.5.com: NJ Rep. Chris Smith – did our government release diseased ticks?

MoreMonmouthMusings.net: House passes Smith's Amendment which could lead to a Lyme disease cure

Here is a very similar Smith amendment that passed the House unanimously in 2019 but did not make it through the Senate.

<https://lymediseaseassociation.org/government/urgent-help-needed-for-biowarfare-investigation/>

Kris Newby's Bitten: LDA book review

All about Kris Newby, the book and access some of the documents used in book.

Lyme Vaccine Candidate: Valneva Announces Phase 2 Study Results



Valneva announced that the vaccine candidate against Lyme disease, VLA15-201, showed positive initial results meeting its endpoints in the Phase 2 study. They stated in the July 22, 2020 press release that “compared to Phase 1, the higher doses used in this trial elicited higher antibody responses across all serotypes.” Of particular note was the the immunological response found in older adults (50-65 years), one of the main target groups for a Lyme vaccine. The vaccine candidate is described as “generally safe across all dose and age groups tested”,

finding no Serious Adverse Events (SAEs) associated with VLA15. This is an important finding given the history of vaccines and serious concerns that have been generated regarding patient safety and vaccines in the Lyme community.

VLA15 is the only active Lyme disease vaccine candidate in clinical development today, covering six serotypes of Lyme disease prevalent in North America and Europe. It was granted Fast Track designation by the U.S. Food and Drug Administration (FDA) in July 2017. In a few months, Valneva expects to report top-line results for the second Phase 2 study, VLA15-202. Valneva and Pfizer are collaborating for development and commercialization of VLA15.

Read full July 22, 2020 press release here

Read Valneva vaccine history and Lyme Disease Association's concerns here:

<https://lymediseaseassociation.org/news/lyme-disease-vaccine-collaboration-announced/>

<https://lymediseaseassociation.org/about-lyme/controversy/vaccine/new-vaccine-in-the-news/>
