

Lyme Disease



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 **MERCK**
Animal Health



What is Lyme disease?

Lyme disease is a bacterial infection transmitted by ticks to dogs, other animals, and people. Most Lyme disease in the United States is spread by the deer tick (pictured below), which is found primarily in the Northeast, Southeast, and Upper Midwest. The western black-legged tick is the primary source of Lyme disease transmission in the western states.¹

DEER TICK (ENLARGED VIEW)





What are the signs of Lyme disease?

Many dogs can have Lyme disease and show no signs. The most common signs include²:

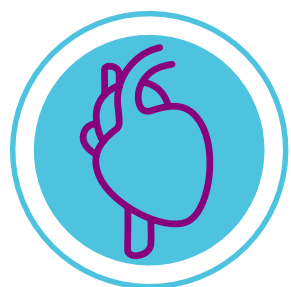
- Fever**
- Loss of appetite**
- Painful or swollen joints**
- Lameness that comes and goes between different legs**
- Loss of energy**

Signs may come and go, vary in severity, and can sometimes be mistaken for those of other conditions.



How serious is Lyme disease?

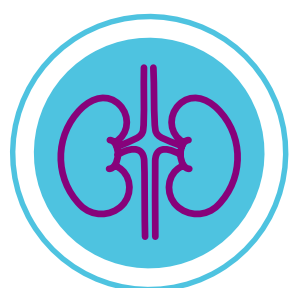
If left untreated, severe cases of Lyme disease can lead to²:



HEART DAMAGE



CENTRAL NERVOUS
SYSTEM DISORDERS



FATAL KIDNEY DISEASE

Your veterinarian will typically diagnose your dog by looking for signs of Lyme disease, then confirm it with a blood test.²

Is my dog at risk of infection?

Any dog can be infected with Lyme disease, but dogs living in or traveling to areas where Lyme disease is prevalent have a higher risk of infection.

What can I do if my dog is infected?

Dogs can be treated for Lyme disease with 4 weeks of antibiotics; however, it's possible that the symptoms could return, requiring further treatment.²



BACTERIA BREAKDOWN

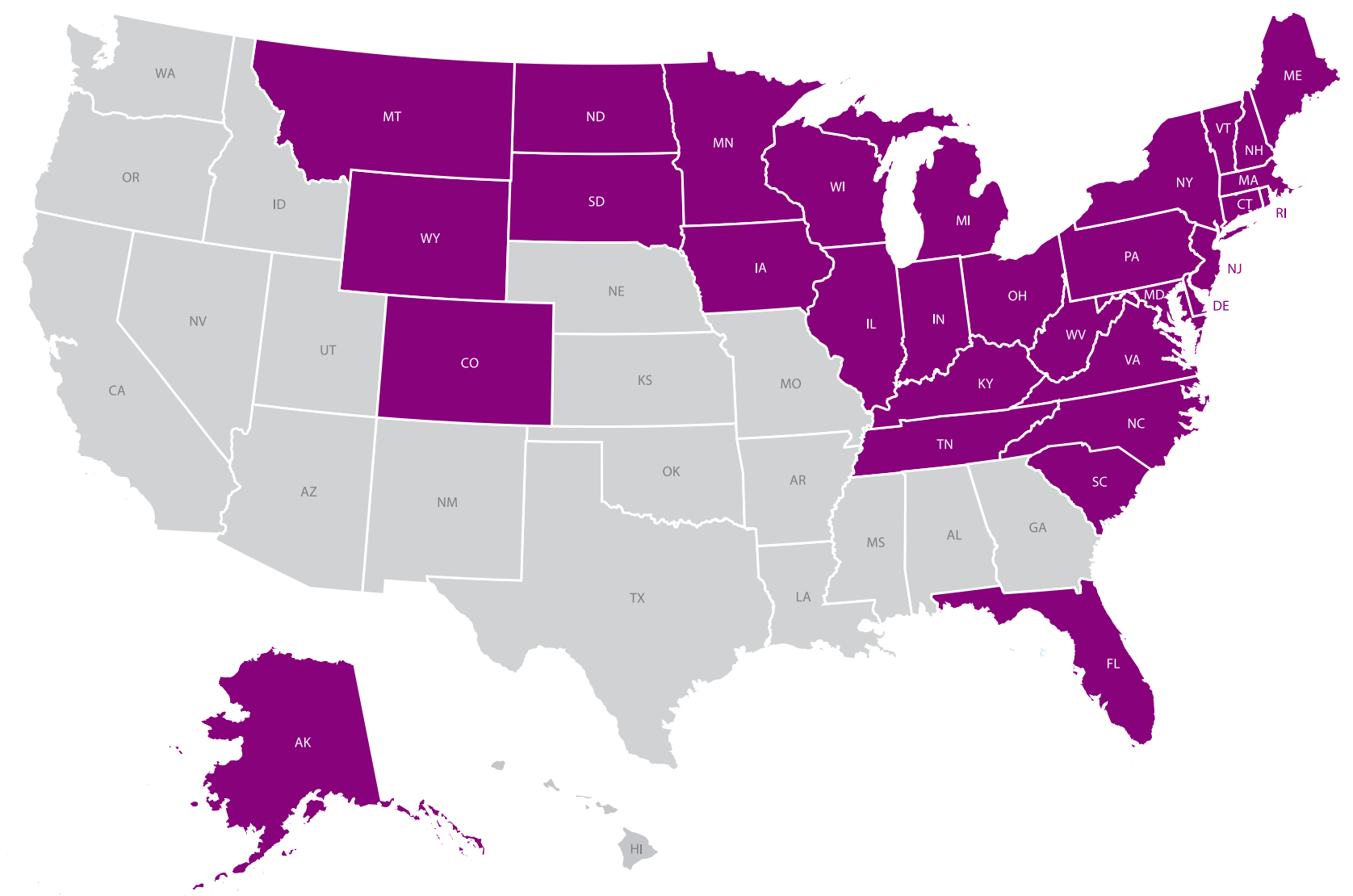
The bacteria that causes
Lyme disease is called
Borrelia burgdorferi.

THAT'S A MOUTHFUL...LITERALLY!

Ticks spread this bacteria by biting an animal
and passing it through their saliva,
while feeding, over the course
of 24–48 hours.²

LYME DISEASE IS A NATIONWIDE THREAT!³

31 STATES have a moderate-to-high prevalence of Lyme disease, but positive cases have been reported in **every state in the US.**³



**The best way to manage
Lyme disease is to prevent it**



How can I protect my dog from Lyme disease?



STOP THE TICK

Keep your dog on year-round preventive medication to kill ticks before they can transmit disease.⁴

Also, check your dog for ticks after spending time outdoors and immediately remove any ticks you find.²



STOP THE BACTERIA

To protect your dog from the bacteria that cause Lyme disease, your dog must be vaccinated against Lyme disease before it is bitten by an infected tick.²

CHECK OUT THE LAST PAGE FOR
A LYME PROTECTION CHECKLIST.



Are Lyme vaccines safe?

Lyme vaccines have been used to protect dogs since 1990.⁵ Side effects are rare,⁶ mild, and typically resolve within a few days.⁷

- **Vaccinating your dog may help keep them safe in case you don't remove an infected tick in time.⁴**

To find out more visit
StopLyme.com

Assess your dog's risk of Lyme disease.

Does your dog live in one of the 31 states with a moderate-to-high prevalence of canine Lyme disease?

Have you taken, or are you planning to take, a trip with your dog to one of the 31 states?

Do you ever take your dog on hunting trips or other outdoor activities?

Does your dog spend a lot of time outdoors?

Has anyone from your local area been diagnosed with Lyme disease?

SHARE YOUR ANSWERS
WITH YOUR VETERINARIAN.

If you answered YES to any of the above questions, it is likely that your dog would benefit from Lyme vaccination.

Lyme Protection Checklist

- 1 Make sure your dog is vaccinated against Lyme disease.
- 2 Ask your veterinarian to recommend a year-round preventive medication.
- 3 After a trip outdoors, check your dog for ticks. Remove them immediately.
- 4 Have your veterinarian screen for ticks and tick-borne diseases at your dog's next visit.
- 5 Be aware of any changes in your dog's behavior. Watch for signs of Lyme disease, such as limping, fever, lack of energy, or loss of appetite.

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References: **1.** Lyme disease—transmission. Centers for Disease Control and Prevention website. Available at: <https://www.cdc.gov/lyme/transmission/index.html>. Accessed November 3, 2020. **2.** Staubinger, RK. Lyme disease (Lyme Borreliosis) in dogs. Available at: <https://www.merckvetmanual.com/dog-owners/disorders-affecting-multiple-body-systems-of-dogs/lyme-disease-lyme-borreliosis-in-dogs>. Accessed November 3, 2020. **3.** Parasite prevalence map—ticks. Companion Animal Parasite Council website. Available at: <https://capcvet.org/maps/#/2023/all-year/lyme-disease/dog/united-states/>. Accessed May 24, 2023. **4.** Lyme disease. Companion Animal Parasite Council website. Available at: <https://capcvet.org/guidelines/lyme-disease/>. Accessed November 3, 2020. **5.** Canine Lyme disease vaccine introduced. United Press International website. Available at: <https://www.upi.com/Archives/1994/10/05/Canine-Lyme-disease-vaccine-introduced/2060781329600/>. Accessed November 3, 2020. **6.** Data on file. Merck Animal Health. **7.** Moore GE, Guptill LF, Ward MP, et al. Adverse events diagnosed within three days of vaccine administration in dogs. *J Am Vet Med Assoc.* 2005;227:1102–1108.