

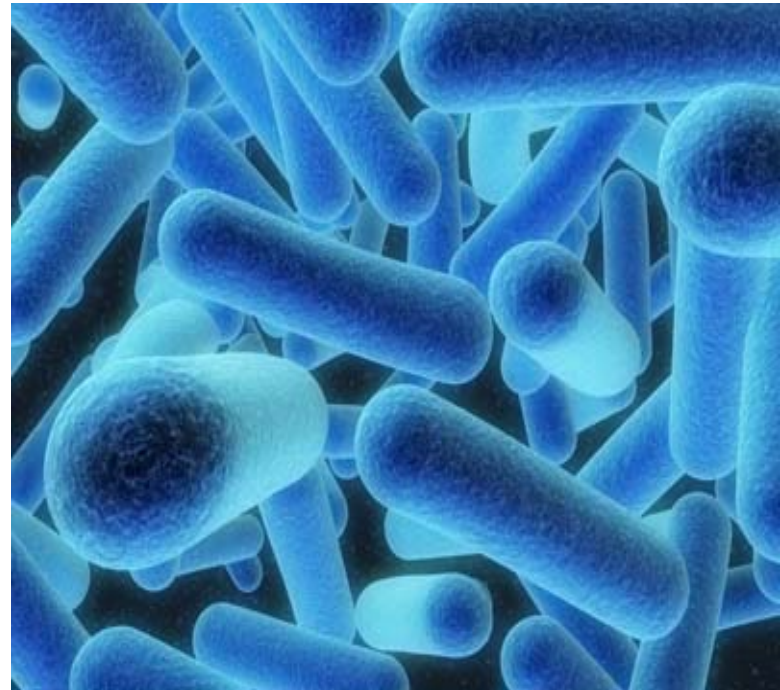


Legionnaires in Eastlake

Ongoing disease
investigation

What is Legionnaires Disease?

- A respiratory disease caused by *Legionella* bacteria
- Legionnaires' disease is very similar to other types of pneumonia, symptoms include:
 - Cough
 - Shortness of breath
 - Fever
 - Muscle aches
 - Headaches



Legionnaires Disease

- About one out of every 10 people who get sick from Legionnaires' disease will die.
- *Legionella* is found naturally in fresh water environments, like lakes and streams, but can become a health concern in human-made water systems.
- Keeping *Legionella* out of water systems in buildings is key to preventing infection.

How to get Legionella

- Inhale aerosolized water containing bacteria



Risk Factors

- **Smoking.** Smoking damages the lungs, making you more susceptible to all types of lung infections.
- **Have a weakened immune system** as a result of HIV/AIDS or certain medications, especially corticosteroids and drugs taken to prevent organ rejection after a transplant.
- **Have a chronic lung disease** such as emphysema or another serious condition such as diabetes, kidney disease or cancer.
- **Are 50 years of age** or older.

First Case

- On 8/23/16, LCGHD notified of case of Legionella at Eastlake CNC facility. A Cleveland resident, smoker in his 50's, passed away from the disease.
- On 8/25/16, 2 sanitarians and the plumbing inspector walked through facility, testing water for ph and chlorine residual. All testing and visual inspection items were in correct parameters.

Second/Third Case

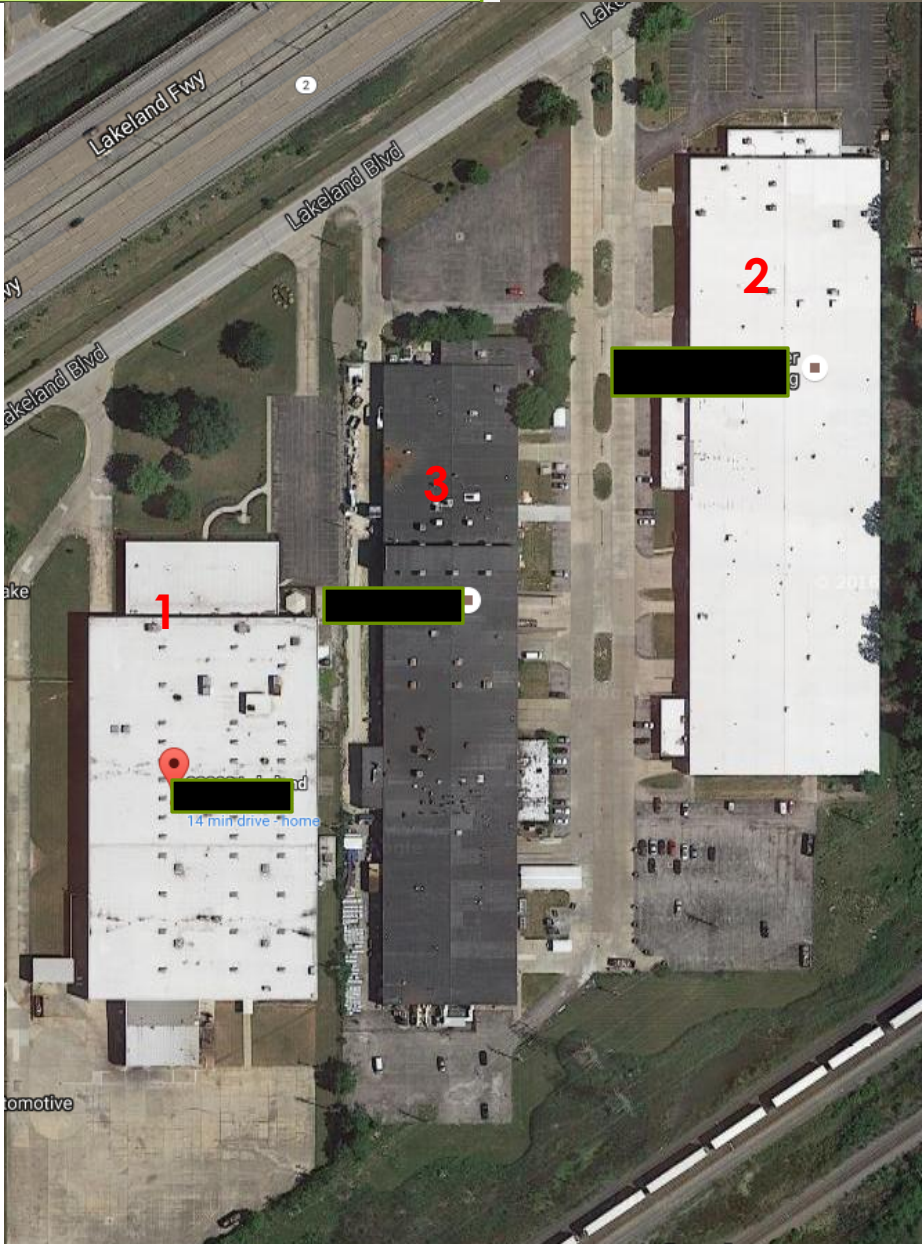
- September 26, two new cases were discovered at businesses neighboring the original case.
- September 30, 2 sanitarians and the plumbing inspector walked through second facility, testing water for pH and chlorine residual. All testing and visual inspection items were in correct parameters.

Second/Third Case

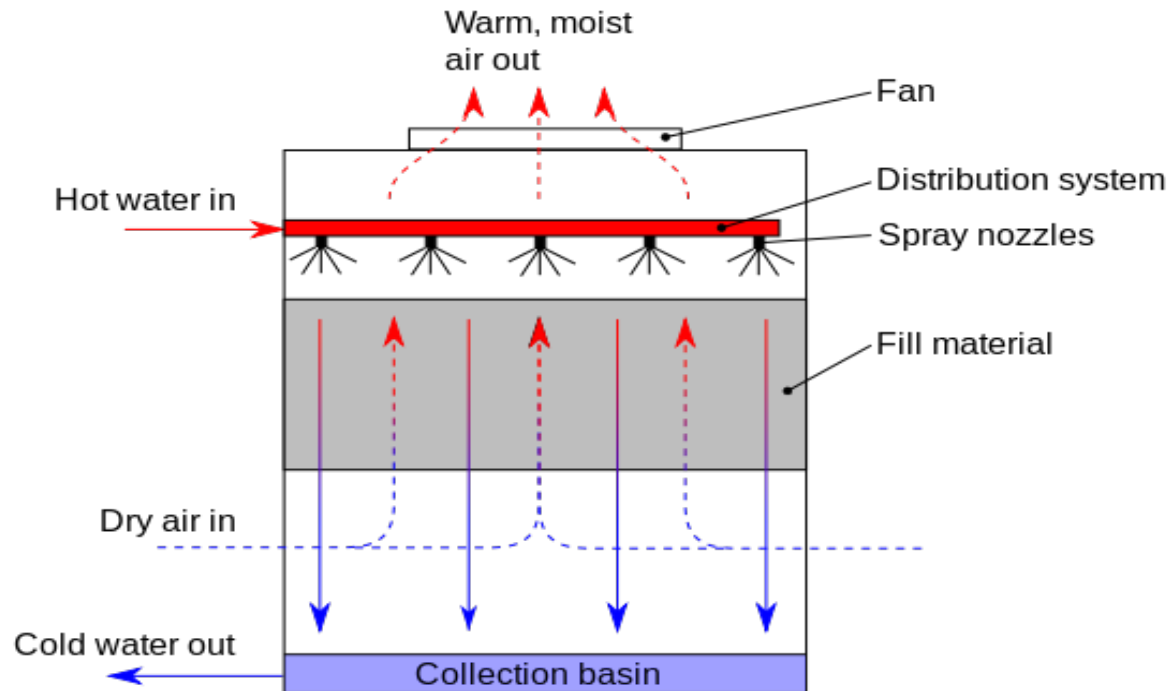
- On October 4th, walk through of 3rd location, 2 sanitarians and the plumbing inspector walked through facility, testing water for pH and chlorine residual. All testing and visual inspection items were in correct parameters, except for cooling tower sump which had cloudy water and possible biofilm.

Outbreak?

- Legionellosis outbreaks occur when two or more people are exposed to *Legionella* and get sick in the same place at about the same time.



Cooling Tower Operation



Outcomes

- Cooling tower sampling results confirmed presence of legionella in cooling tower water .
- 11/9/16 Tower was sanitized and resampled. Results showed absence of bacteria.

