



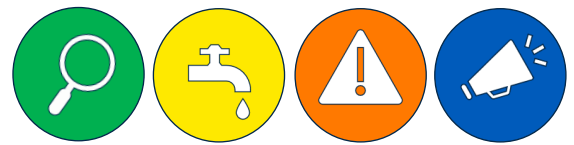
Legionnaires' Disease Risk Communication Toolkit



Routine Environmental Testing Results in the Absence of Cases Module



Routine Environmental Testing Results in the Absence of Cases Module



Welcome to the Routine Environmental Testing Results in the Absence of Cases Module (the Routine Environmental Testing Module), a supplement to the *Legionnaires' Disease Risk Communication Toolkit*. **This module is intended to be used as an adjunct to the other setting-specific modules.** It should be used when positive environmental samples indicate the presence of *Legionella* in a facility's building water system or device commonly associated with Legionnaires' disease (LD), but no recent cases are associated with it. Specifically, this module is intended only for circumstances in which there are no recent LD cases that report exposure to the facility or a device during the 14 days prior to their illness onset. The Routine Environmental Testing Module contains the following information:

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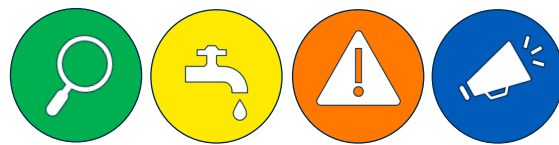
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The individual chapters in the *Legionnaires' Disease Risk Communication Toolkit* document provide foundational information applicable all the settings in which exposure to *Legionella* most commonly occurs. The *LDRC Toolkit* document offers key information about Legionnaires' disease (LD), identifies legal issues, discusses important considerations when communicating about LD with stakeholders and the public, and provides an overview of water management programs (WMPs). The information in these chapters applies to all the settings in which exposure to *Legionella* most commonly occurs. The *LDRC Toolkit's* supplemental modules are a series of setting- and scenario-specific documents that address LD-related information and messaging targeted for that setting. The setting- and scenario-specific modules are:

- Healthcare Facilities
- Congregate Residential Facilities
- Hotels and Hospitality Facilities
- Community Settings
- Routine Environmental Test Results in the Absence of Cases

Each module also provides templates and sample messages for key communication items such as notification letters, public health orders, press releases, and health department advisories. The modules also identify practice tips and other resources to help state, tribal, local, and territorial (STLT) health agency staff communicate the risks of LD in these specific settings and scenarios to target audiences.

Variables Affecting LD Outbreaks

The goal of the modules is to provide STLT health agency staff with clear guidance about communicating LD risks in a specific setting or scenario and tools to use in those efforts. However, it is important to note that there are many factors that may affect a jurisdiction's investigation, response, and communications about a specific LD outbreak. The following factors are just some of the variables that can influence the course of an LD outbreak—even within the same types of settings—and the response to it:

- Potential for population with increased risk for LD in the setting
- Overnight stay at the setting or not
- Commercial setting or non-commercial setting
- Length of exposure in the setting
- Mixed/hybrid settings (i.e., locations with features common to different LD risks)
- Environmental assessment and environmental sampling *Legionella* results

Above all, these modules provide a starting point from which to tailor risk communication about LD outbreaks in the identified setting. Each jurisdiction can make its own determination about

the nature and scope of its investigation and response, and the messages and targets for communication, given the specifics of each LD outbreak and the jurisdiction's laws, regulations, and policies.

Module Components

The setting- and scenario-specific modules follow the same format and include the following sections:

- **Scope of Module**—Provides a quick overview of the types of buildings and facilities addressed in the module.
- **Factors Affecting Investigation**—Discusses factors in the specific setting (e.g., healthcare, congregate residential) or scenario (i.e., routine environmental test results in the absence of cases) that help determine how a public health agency addresses LD cases or an outbreak in that setting.
- **Key Risk Factors**—Identifies and discusses the key risk factors in the setting that can give rise to *Legionella* growth and LD. This section addresses risk factors associated with buildings and facilities as well as factors affecting persons who occupy or visit the setting. Each module includes a one-page figure summarizing these key risk factors for quick reference.
- **Key Audiences and Messages Overview**—Identifies and addresses the key audiences for messaging in the module setting. The section discusses the relevance and role of each audience to the identification, investigation, mitigation, and prevention of *Legionella* and LD.
- **Key Audience and Messaging Tables**—Series of tables provides detailed messaging guides geared to each key audience in the setting or scenario. This section opens with an index table that lists all the messaging table templates by audience. Each series of color-coded key audience tables includes one or more messaging scenarios for that audience. Each messaging table contains an annotated, customizable template of text to include in communications about that scenario.
- **Toolkit Appendix**—Provides other samples and templates related to the content of the module.

Finally, the messaging needed in a specific scenario or outbreak will vary with the unique facts of that event and the laws and policies of the jurisdiction where it is occurring. **For this reason, the information in each module and the messaging tables, templates, and samples should be used as a starting point to craft communications tailored to the user's specific needs and circumstances.**



A facility may sometimes identify positive environmental samples for *Legionella* while conducting routine testing as part of its water management program (WMP); however, there may not be any recent cases of Legionnaires' disease (LD) associated with that facility. If this occurs, facility owners and operators may reach out to public health partners regarding communication guidance. It is important to consider the interpretation of test results in addition to the facility type and the persons potentially exposed when deciding what, how, and to whom to communicate.

Scope of Module

This module supplements messaging in the other setting-specific modules (e.g., Healthcare, Hotels). Consult this module when positive environmental samples indicate the presence of *Legionella* in a facility building water system or device commonly associated with Legionnaires' disease (e.g., cooling towers, hot tubs, decorative fountains) when no cases are associated with it. **Specifically, this module is intended only for circumstances in which there are no recent LD cases that report exposure to the facility or a device during the 14 days prior to their illness onset.** The module addresses:

- The role of routine testing in a WMP.
- Factors affecting messaging based on routine testing results.

Readers should see messaging guidance in the other modules for instances in which cases report exposure to the facility or device during the 14 days prior to their illness onset. If cases report exposure to the facility or device during the 14 days prior to illness onset, they should be considered associated with that facility or device, and this module is not applicable. The timeframe for identifying recent cases may be informed by the routine testing frequency (e.g., since the last round of testing results which indicated the system was well controlled) or other components of the water management program (e.g., since the water quality parameters changed due to decreased occupancy).

Routine Testing in Water Management Programs

LDRC Toolkit Chapter 6 ("Water Management Programs") provides basic information about WMPs and their role in preventing LD in certain types of buildings and devices that are at increased risk for the growth and spread of *Legionella*. The U.S. Centers for Disease Control and Prevention (CDC) created a publication, *Developing a Water Management Program to Reduce Legionella Growth and Spread in Buildings* (the *Toolkit for Developing a WMP*), to help building owners and operators determine if they should develop a WMP for the building or for specific devices (CDC, 2021s). The CDC's *Toolkit for Developing a WMP* is for use in conjunction with ASHRAE Standard 188 *Legionellosis: Risk Management for Building Water Systems* (ASHRAE, 2021).

A key aspect of a WMP is establishing that the program is effectively controlling potentially hazardous conditions in the facility's water systems and devices. The process of confirming the



effectiveness of the WMP is known as validation (CDC, 2021s). Routine testing for *Legionella* is a common method for WMP validation. ASHRAE Guideline 12 *Managing the Risk of Legionellosis Associated with Building Water Systems* (2020) and CDC's *The Toolkit for Controlling Legionella in Common Sources of Exposure (the Legionella Control Toolkit)* (CDC, 2021a) provide additional information around routine testing, including considerations for when and how to perform testing as well as interpreting routine test results. (See "Tools for Analyzing & Responding to Routine Environmental Sampling Results" box below.)

Key Factors Affecting Messaging based on Routine Testing Results

There are two key factors that affect the need for messaging and the contents of the message in response to routine testing results for *Legionella*:

- The risk profile of the population served by the facility.
- The interpretation of the routine testing results.

Risk Profile of the Population Served

The need for messaging and the type of message will first depend on the risk profile of the population served by the facility. Specifically, whether the facility serves a population at increased risk for LD ("increased risk") or serves a population that is not at increased risk for LD ("general risk"). The most significant distinction between facilities serving increased-risk and general-risk populations is the differences in health status and other risk factors that heighten a person's susceptibility to LD. These risk factors include being aged 50 years and older, being a current or former smoker, or having a higher risk of infection (e.g., have a chronic illness, respiratory disease, or a weakened immune system). (See *LDRC Toolkit* Chapter 1 "Legionnaires' Disease Basics".)

- **Facilities serving increased-risk populations**—Healthcare facilities and certain congregate residential facilities generally serve individuals with one or more characteristics that puts them at higher risk for acquiring LD. Congregate residential facilities like assisted living, senior living, correctional facilities, group homes, and homeless and transitional housing residents who may be at greater risk for LD due to age or other underlying conditions are considered facilities that serve increased-risk populations. Patients and residents at healthcare and these types of congregate residential facilities may also have a greater risk for aspirating water, which allows water to enter the lungs, or they may be more likely to use personal respiratory equipment that uses water (e.g., CPAP machines). Readers should reference the Healthcare Facilities Module and the Congregate Residential Facilities Module for more information about risk factors related to the water system design, risk of aerosolization based on the devices present, and the populations served in these types of facilities.
- **Facilities serving general-risk populations**—These kinds of facilities serve individuals with the same general level of risk as the community in which the property is located. Residents in properties like apartments, condominiums, dormitories, or other similar congregate residential facilities generally have fewer risk factors for acquiring LD than facilities serving increased-risk populations. Persons staying at or visiting hotels and other hospitality venues and occupants of buildings in a community setting such as schools,



places of worship, commercial, and private homes can be mostly characterized as having a general level of risk for acquiring LD. However, it is important to note that residents, guests, employees, volunteers, visitors, and others in general-risk facilities may also have individual risk factors that put them at increased risk for LD. Readers should reference the Hotels and Hospitality Facilities Module and the Community Settings Module for more information about facilities serving general-risk populations.

Interpretation of Routine *Legionella* Testing Results

The risks associated with positive routine *Legionella* testing results and much of the corresponding communication strategy will depend on the interpretation of the results. CDC notes that the results of routine *Legionella* testing by themselves do not determine health risk or the likelihood of LD. Importantly, CDC emphasizes that while "[t]here is no "safe" level or type of *Legionella*," other factors should be considered when interpreting routine testing results (CDC, 2021a):

- Testing results indicate presence of *Legionella* only within that sample; conditions within a water system vary.
- Results can be affected by how the sample was handled, transported, and processed in a laboratory.
- Results are interpreted using a multifactorial approach that considers the amount of *Legionella* present, the extent of *Legionella* distribution within a system, the type of *Legionella* detected, and trends over times such as changes in *Legionella* concentration.

CDC further notes that the presence of any *Legionella* should prompt response activities (CDC, 2021a).

Tools for Analyzing and Responding to Routine Environmental Sampling Results

CDC's *The Toolkit for Controlling Legionella in Common Sources of Exposure* (the *Legionella Control Toolkit*) contains modules with specific performance indicators and suggested response activities when routine testing results suggest that *Legionella* is not well controlled in commonly implicated sources of LD outbreaks. Of note is the **Routine Testing Module**, which includes practical information, such as values for performance indicators and a multifactorial approach to understanding test results.

The Routine Testing Module is available at: <https://www.cdc.gov/legionella/wmp/control-toolkit/routine-testing.html>.

The full *Legionella Control Toolkit* is available at <https://www.cdc.gov/legionella/wmp/control-toolkit/index.html>.

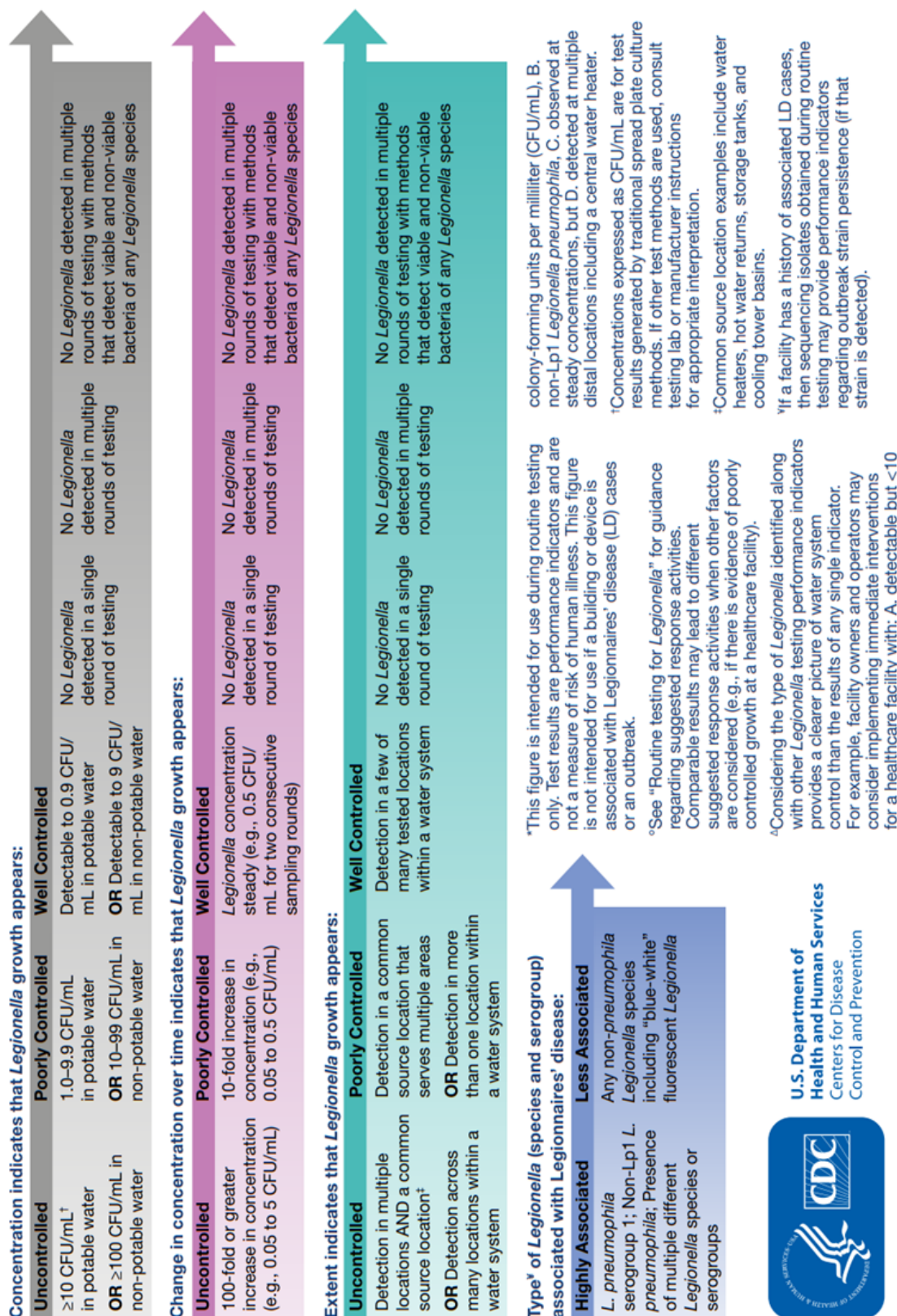
Testing results can be placed on a continuum from uncontrolled *Legionella* growth, poorly controlled growth, and well controlled growth using specific multifactorial performance indicators as shown in Figure 1 from CDC's *Legionella Control Toolkit*. The factors and interpretation guidance can help a facility to understand whether results are consistent with a system or device for which *Legionella* is well controlled, poorly controlled, or uncontrolled.

Positive Routine Testing Results Messaging Scenarios

The extent to which *Legionella* growth is controlled informs the messaging about positive routine testing results in the absence of recent cases.



Figure 1. Routine *Legionella* testing: A multifactorial approach to performance indicator interpretation^{*a,b}





Well Controlled *Legionella* Growth

If environmental test results are interpreted as consistent with a system that is well controlled for *Legionella*, then messaging is unlikely to be necessary. If any messaging is determined to be necessary due to facility policy or other rules or regulations, then messaging can emphasize that:

- *Legionella* is present in freshwater sources.
- It is not uncommon to detect *Legionella* in environmental samples.
- Samples were tested for routine purposes and there are no associated cases of LD.
- Testing results are indicative of a system/device that is well controlled for *Legionella*.
- Facility operators continue to perform *Legionella* control activities to promote water safety for employees, clients, patients, residents, staff, visitors, and others.

Uncontrolled or Poorly Controlled *Legionella* Growth

If environmental test results are interpreted as consistent with a system or device in which *Legionella* is poorly controlled or uncontrolled, then communication may be warranted for persons potentially exposed to that system or device.

- **Uncontrolled in a facility serving increased-risk populations**—Messaging should be provided if the results are consistent with a system or device for which *Legionella* is uncontrolled and the facility serves a population at increased risk of LD (e.g., healthcare, assisted living, corrections facility). Messaging for this situation would also need to include information about corrective actions to respond to *Legionella* and immediate interventions that may be put into place (e.g., point-of-use filters, using bottled water, restricting water usage).
- **Uncontrolled in a facility serving general-risk populations**—If test results are indicative of a system or device for which *Legionella* is uncontrolled but which serves a general population, then messaging may be indicated according to specific factors for the *Legionella* test results, the facility or device setting, the specific population served, any facility policies, rules or regulations, or a history of associated LD cases.
- **Poorly controlled in a facility serving increased-risk or general-risk populations**—If test results are indicative of a system or device for which *Legionella* is poorly controlled regardless of the type of population served, then messaging also may be indicated according to specific factors for the *Legionella* test results, the facility or device setting, the specific population served, any facility policies, rules or regulations, or a history of associated LD cases.

See Figure 2 for a summary of test results messaging scenarios. Also reference CDC's *Legionella* Control Toolkit module on routine testing for information about routine testing considerations (CDC, 2021a).



Figure 2: Summary of Routine Testing Messaging Scenarios

		Population Served	
		General Population	Increased-risk Population
Legionella Growth	<i>Well Controlled</i>	Messaging is unlikely to be indicated	Messaging is unlikely to be indicated
	<i>Poorly Controlled</i>	Messaging may be indicated	Messaging may be indicated
	<i>Uncontrolled</i>	Messaging may be indicated	Messaging should likely be provided

Key Audiences and Messages

Each facility and device setting has potential key audiences for messaging about routine testing for *Legionella*, corrective actions if applicable, prevention measures, and information about identifying LD. Each of these persons and organizations may require foundational information about LD as well as information tailored to their perspective in the testing event.

Facility

Owners, operators, and managers are generally both the operational and legal points of contact for suspected and confirmed public health communicable disease prevention activities; however, this should be confirmed by the laws and regulations in a specific jurisdiction. A facility's owners, operators, or managers are also likely to be a key source of information about residents, patients, staff, visitors, volunteers, and other persons who stayed, worked at, or visited the facility.

Depending on the laws, regulations, or policies of a jurisdiction, facility managers and employees may be required to report and/or provide messaging about positive *Legionella* test results obtained during routine testing even without any recent LD cases having reported exposure at the facility during the 14 days prior to symptom onset. With some facilities such as schools or universities, other government agencies are likely to be involved in communication about results.

Public health agency communication with facilities that have not had a recent associated LD case will likely focus on discussing the specific test results, the potential for *Legionella* transmission, and encouraging good water management practices and testing of the facility's systems for *Legionella*. Specifically, the facility representatives should be informed about interpretation of their test results and, if applicable, corrective actions to control *Legionella* in the facility's water systems, cooling towers, and plumbed water features, as well as other equipment or devices that use water. If a facility's test results are indicative of uncontrolled *Legionella* growth and there is concern about risk of potential exposure and general risk communication methods are ineffective at promoting action by the facility, messaging about and the use of public health orders or other enforcement mechanisms may be helpful.



Residents, Patients, Patrons, and Visitors

Any messaging for residents, patients, patrons, and visitors must be clear and use plain language. Messaging should inform them about the positive environmental testing results and put the results in context, such as the routine nature of the testing, natural sources of *Legionella*, and that no recent cases have been associated with the facility. Messaging should also include information about potential risk of exposure to systems and devices where *Legionella* is uncontrolled or poorly controlled and timing (if known), and how to speak with their doctor about the exposure. Communications may also address the cause, sources, risk factors, and symptoms of LD. Consider including language advising recipients to speak with a medical provider if they develop symptoms within 14 days of exposure. Points of contact and sources for additional information should also be clearly communicated.

Employees and Contractors

Similar to the messaging for residents, patients, patrons, and visitors, any messaging for employees and contractors should contain clear information about the positive environmental testing results and put the results in context by noting the routine nature of the testing, natural sources of *Legionella*, and that no recent cases have been associated with the facility. Messaging should include information about specific potential exposure to systems and devices where *Legionella* is uncontrolled or poorly controlled and timing (if known). Communications may also address the cause, sources, risk factors, and symptoms of LD. It should also address how the facility would like employees/contractors to proceed if they become ill or are worried about having been exposed, or how to speak with their doctor about any potential exposure. Additionally, a jurisdiction's occupational health and safety laws and workers' compensation system, as well as obligations arising from union contracts, and other agreements or personnel policies affecting the rights of employees or contractors can arise. Further, the issue of personal protective equipment (PPE) may arise if there are employees/contractors at higher risk (whether due to personal medical history or exposure risks due to job duties (e.g., cooling tower maintenance). Points of contact within the organization, employee rights, and sources for additional information should also be clearly communicated.

Healthcare Providers

If routine testing indicates *Legionella* growth is poorly controlled or uncontrolled within a healthcare facility, then healthcare providers should be alerted so they can monitor their patients for *Legionella* exposure and LD symptoms. The public health agency can also provide guidance on appropriate diagnostic testing and treatment, and instructions about retaining or forwarding clinical specimens or isolates. In absence of associated cases or evidence of an ongoing outbreak, notification of providers at other facilities or health alerts are unlikely to be indicated.

Other Agencies and Governments

A public health agency may inform other divisions within the public health agency, other government agencies, and other units of government (i.e., local, regional, state, federal, tribal, territorial) about positive routine environmental test results for *Legionella* as required by law, standard procedure, or voluntarily as public health partners. Depending on the extent and nature of a routine sampling event, other divisions, agencies, or units of government may have



regulatory or other legal authority over the operation of a facility (e.g., building code enforcement, environmental health/sanitation inspections, recreational water inspections).

Media and the Public

Providing information to the media and the public about routine environmental testing results is often unnecessary but may be appropriate if testing indicates that *Legionella* growth is uncontrolled or poorly controlled in a water system or device to which unknown persons are likely to have been recently exposed. Additionally, some facilities may have policies around communication or be subject to rules or regulations requiring communication around routine environmental testing results for *Legionella*. Communication about routine testing results in the absence of cases should be approached taking care to balance the privacy interests of the involved facilities with the right of the public to be made aware of public health threats. (See *LDRC Toolkit* Chapter 3 “Accessing Information and Confidentiality” for more information.) Routine testing results may generate significant ongoing public and media attention even in the absences of associated LD cases. Issuing press releases and other statements about routine testing results indicative of *Legionella* control issues can help to identify other persons who may have been exposed and alert them to the symptoms to watch for during the incubation period. Finally, sharing information about the role of routine testing in validating WMPs for *Legionella* control and prevention of LD can help to assure the public that the facility is being proactive.

Routine Environmental Testing Module References

ASHRAE. (2020). *Managing the risk of legionellosis associated with building water systems*. Guideline 12. <https://www.ashrae.org/technical-resources/standards-and-guidelines/read-only-versions-of-ashrae-standards>

ASHRAE. (2021). *Legionellosis: Risk management for building water systems*. Standard 188. <https://www.ashrae.org/technical-resources/standards-and-guidelines/read-only-versions-of-ashrae-standards>

Centers for Disease Control and Prevention. (2021a, January 13). *Legionella (Legionnaires' disease and Pontiac fever): The toolkit for controlling Legionella in common sources of exposure*. Version 1.1. <https://www.cdc.gov/legionella/wmp/control-toolkit/index.html>

Centers for Disease Control and Prevention. (2021b, June 24). *Developing a water management program to reduce Legionella growth and spread in buildings: A practical guide to implementing industry standards*. Version 1.1. <https://www.cdc.gov/legionella/downloads/toolkit.pdf>

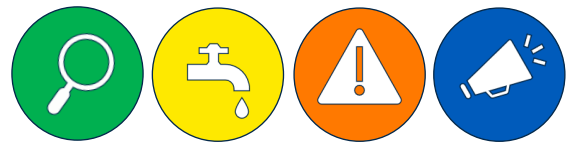


Routine Environmental Testing Module Selected Resources

- ASHRAE. Standard 188: Legionellosis: Risk Management for Building Water Systems (ANSI approved). Read-only access available at: <https://www.ashrae.org/technical-resources/standards-and-guidelines/read-only-versions-of-ashrae-standards>.
- ASHRAE. Guideline 12: Managing the Risk of Legionellosis Associated with Building Water Systems. Read-only access available at: <https://www.ashrae.org/technical-resources/standards-and-guidelines/read-only-versions-of-ashrae-standards>.
- CDC. Legionnaires' Disease Communication Resources. Available at: <https://www.cdc.gov/legionella/health-depts/communications-resources.html#press-releases>.
- CDC. Guidance for Reopening Buildings After Prolonged Shutdown or Reduced Operation. Updated May 7, 2020. Available at: <https://www.cdc.gov/nceh/ehs/water/legionella/building-water-system.html>.
- CDC. Toolkit for Controlling *Legionella* in Common Sources of Exposure. Available at: <https://www.cdc.gov/legionella/wmp/control-toolkit/index.html>.
- CSTE. Water Management Program Template. Available at: <https://www.cste.org/general/custom.asp?page=Legionnaires>.
- OSHA. Legionellosis (Legionnaires' Disease and Pontiac Fever). Available at: <https://www.osha.gov/legionnaires-disease>.



Routine Environmental Testing Results in the Absence of Cases Messaging Tables



This module is intended only for circumstances in which there are no recent LD cases that report exposure to a facility or device during the 14 days prior to illness onset. See messaging guidance in the other modules for instances in which cases report exposure to the facility or device during the 14 days prior to illness onset.

This section of the module contains messaging tables that address three scenarios based on the results of routine environmental testing at a facility in which there have been no recent LD cases reported: messaging is not indicated, messaging may be indicated, and messaging is likely indicated. Readers should consider the following items when using these messaging tables in conjunction with messaging in the other setting-specific modules:

- The messaging tables are color-coded to match the messaging levels described in Figure 2 of this module (Summary of Routine Testing Messaging Scenarios).
- Each table has a series of key statements applicable to any audience. These key statements are then followed by a series of audience-specific color-coded messaging statements and user notes.
 - The same audience colors are used in this module as in the other modules.
 - The same colors are used across all the modules for the same audiences (e.g., materials for the press and public are in tables with orange banners).
- Each messaging table contains an annotated template of text to include in communications about that scenario.
 - Module users are free to choose which content to use in a template and modify it according to their needs.
- ***Italicized topic headings*** introduce a series of bulleted statements with text that can be adapted into letters, handouts, or notices.
 - Topic headings are not necessarily intended to be used in messaging documents.
- [Text in brackets] can be edited or added by the user to tailor a document for the specific use.
 - For example, "The [state/local health agency] has identified..." becomes "The Anytown Health Department has identified..."
- *[Italicized text in brackets]* are instructions to the user and are not intended to be included in messaging documents.

The next page contains an index of the messaging tables and lists each key audience and messaging scenarios addressed. The index also lists the corresponding module page numbers for the messaging tables.

Additional sample documents and templates are available in the *LDRC Toolkit* appendix.



Index of Routine Environmental Testing Module Messaging Tables		
Messaging Indicated or Not	Messaging Scenarios	Module Page
Messaging <u>not</u> indicated	Routine testing results show <i>Legionella</i> well controlled in a facility serving increased-risk and general-risk populations	RT-19
Messaging may be indicated	Routine testing results show poorly controlled <i>Legionella</i> in a facility serving general risk or increased-risk populations OR Uncontrolled <i>Legionella</i> in a general-risk facility	RT-21
Messaging is likely indicated	Routine testing results show uncontrolled <i>Legionella</i> in a facility serving increased-risk populations	RT-25

IMPORTANT NOTE:

The messaging indicated in a specific scenario or outbreak will vary with the unique facts of that event and the laws and policies of the jurisdiction where it is occurring. **For this reason, these messaging tables, templates, and samples should be used as a starting point to craft communications tailored to the user's specific needs and circumstances.**



Routine Environmental Testing–Messaging Not Indicated

Messaging Scenario:

- Routine testing results show *Legionella* well controlled in a facility serving increased-risk and general-risk populations
 - Messaging not indicated

[If environmental test results are interpreted as consistent with a system that is well controlled for Legionella, then messaging is unlikely to be necessary for facilities serving general-risk and increased-risk populations. If any messaging is determined to be necessary due to facility policy or other rules or regulations, then messaging can emphasize the messaging points below along with the audience-specific messages that follow.]

Overall messaging points:

- We are writing to inform you that [facility name] has had positive environmental test results for *Legionella* bacteria, which cause Legionnaires' disease (LD), during routine testing conducted at the facility.
- *Legionella* is present in freshwater sources, and it is not uncommon to detect *Legionella* in environmental samples.
- The samples from [facility name] were tested for routine purposes and there are no known associated cases of LD as of [date].
- The overall results are indicative of a [system/device] that is well controlled for *Legionella*.
- Facility operators continue to perform *Legionella* control activities to promote water safety for [patients, residents, staff, and visitors].
- You are being informed about the positive routine test results [as required by law and] so [you/your facility] may take precautionary measures to limit [your/patrons'] exposure to *Legionella* until the situation is resolved.

Notes:

Users may also want to include messaging from the corresponding setting-specific module for the key audience that addresses:

LD basics, potential sources of exposure, risk factors for LD, symptoms and treatment, action steps requested (e.g., seek medical help if develop symptoms), actions being taken, if any, and where to get additional information.

Additional messaging highlights in this table are intended to supplement messaging for key audiences in other relevant modules and should be used in conjunction with the messaging tables in the other modules.

Audiences

Facility

- Test results indicate that *Legionella* is well controlled in your facility [as of date].
- [Facility] can take additional measures to further control *Legionella* growth through use of a water management program (WMP) (or instituting a WMP) [and taking additional actions identified by the health agency (if applicable)].
- [Your facility [should/may] contact the [state/local health agency] for assistance [and/or when the facility no longer tests positive for *Legionella*].
- If your become aware of any case of LD among [patients, residents, visitors, or staff members] at your facility, contact [state/local health agency] immediately.

[Continued next page]

Routine Environmental Testing–Messaging Not Indicated

Messaging Scenario: Routine testing results show *Legionella* well controlled in a facility serving increased-risk and general-risk populations (*continued*)

Persons

[If required by policy or law, identify potential risk of exposure to systems and devices where Legionella is well controlled and timing (if known) for persons associated with that facility.]

- If you begin to have symptoms of LD within 14 days of being at [facility name], see your physician immediately.

[For staff members: address whether PPE is recommended and for whom based on potential risk of exposure to systems and devices. See staff messaging tables in the setting-specific modules.]

Healthcare Providers and Facilities

[Healthcare providers associated with a facility with well controlled Legionella may be alerted if required by policy or law so they can monitor their patients for Legionella exposure and LD symptoms. However, in the absence of associated cases or evidence of an ongoing outbreak, notification of providers at other facilities or health alerts are unlikely to be indicated.]

- If you become aware of any case of LD among patients, visitors, or staff members at [facility name], contact [state/local health agency] immediately.

Other Agencies and Governments

[Although unlikely, public health may inform other agencies and governments about positive routine environmental test results for Legionella as required by law, procedure, or voluntarily.]

- If your [agency/jurisdiction] becomes aware of any cases of LD among persons who were exposed to [facility name], contact [state/local health agency] immediately.

Media and the Public

[Providing information to the media and the public about routine test results is often unnecessary, especially if Legionella is well controlled. If the colonization becomes poorly controlled or uncontrolled or is associated with LD cases, a media release may be warranted. See other setting-specific modules for additional important information to include in media releases.]

- If someone resides in/visited [facility name] and developed symptoms of LD within 14 days of their visit, they should contact their healthcare provider and seek medical attention right away.



Routine Environmental Testing–Messaging May Be Indicated

Messaging Scenario:

- Routine test results show poorly controlled *Legionella* in a facility serving general risk or increased-risk populations
OR
- Uncontrolled *Legionella* in a general-risk facility
 - Messaging may be indicated

[If test results are indicative of a system for which Legionella is uncontrolled but which serves a general population, or if results are indicative of a system for which Legionella is poorly controlled for general and increased-risk populations, then messaging may be indicated according to specific factors for: Legionella test results, facility or device setting, population served, facility policies, rules or regulations, or a history of associated LD cases.]

For example, an outpatient ophthalmology clinic serves a patient population that is likely to be less susceptible to LD than those of an outpatient chemotherapy clinic. Similarly, it may be reasonable to inform hotel guests that may have been in contact with a lobby decorative fountain with uncontrolled Legionella growth but it would be impractical to notify all persons that may have been in proximity to a decorative fountain outdoors at a public park.]

Overall messaging points:

- We are writing to inform you that [facility name] has/had positive environmental sample results for *Legionella* bacteria, which cause Legionnaires' disease (LD), during routine testing conducted at the facility.
- As of [date], no known cases of LD have been associated with [facility name].
- You are being informed about the positive routine *Legionella* test results [as required by law and] so [you/your facility] may take precautionary measures to limit [your/patrons'] potential exposure to *Legionella* until the situation is resolved.

Notes:

Include messaging from the corresponding setting-specific module for the key audience that addresses:

LD basics, potential sources of exposure, risk factors for LD, symptoms and treatment, action steps requested (e.g., seek medical help if develop symptoms), actions being taken, if any, and where to get additional information.

Additional messaging highlights in this table are intended to supplement messaging for key audiences in other relevant setting-specific modules and should be used in conjunction with the messaging tables in the other modules.

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Routine Environmental Testing–Messaging May Be Indicated

Messaging Scenario: Routine test results show poorly controlled *Legionella* in a facility serving general risk or increased-risk populations OR uncontrolled *Legionella* in a general-risk facility (*continued*)

Audiences

Facility

- Test results indicate that *Legionella* is [poorly controlled/uncontrolled] in your facility [as of date].
- [Facility] should take immediate action to control *Legionella* growth through use of a water management program (WMP) (or instituting a WMP) [and to take additional actions identified by the public health agency].
- *[Provide information about specific response actions for Legionella.]*
- *[Identify immediate interventions that may be put into place as appropriate (e.g., point-of-use filters, using bottled water, restricting water usage).]*
- [Your facility [should/may] contact the [state/local health agency] for assistance [and/or when the facility no longer tests positive for *Legionella*].
- If you become aware of any case of LD among [patients, residents, visitors, or staff members] at your facility, contact [state/local health agency] immediately.

Persons

[If possible, identify potential risk of exposure to systems and devices where Legionella is uncontrolled or poorly controlled and timing (if known).]

- If you begin to have symptoms of LD within 14 days of being at [facility name], see your physician immediately.

[For staff members: address whether PPE is recommended and for whom based on potential risk of exposure to systems and devices. See staff messaging tables in prior setting-specific modules.]

Healthcare Providers and Facilities

[Healthcare providers associated with a facility with poorly controlled or uncontrolled Legionella should be alerted so they can monitor their patients for Legionella exposure and LD symptoms. However, in the absence of associated cases or evidence of an ongoing outbreak, notification of providers at other facilities or health alerts is unlikely to be indicated.]

- If you become aware of any case of LD among patients, visitors, or staff members at [facility name], contact [state/local health agency] immediately.

[If results are indicative of poorly controlled or uncontrolled Legionella growth within a healthcare setting, see messaging tables for healthcare providers in the Healthcare Facilities module for directions to monitor for cases and test persons with LD symptoms.]

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Routine Environmental Testing–Messaging May Be Indicated

Messaging Scenario: Routine test results show poorly controlled *Legionella* in a facility serving general risk or increased-risk populations OR uncontrolled *Legionella* in a general-risk facility (continued)

Other Agencies and Governments

[Inform other agencies and governments about positive routine environmental test results in a facility with poorly controlled/uncontrolled Legionella if required by law, standard procedure, or voluntarily.]

- If your [agency/jurisdiction] becomes aware of any cases of LD among persons who were exposed to [facility name], contact [state/local health agency] immediately.

Media and the Public

[Providing information to the media and the public about routine test results in the absence of cases is often unnecessary but may be appropriate if testing indicates that Legionella growth is uncontrolled or poorly controlled in a system or device to which unknown persons are likely to have been recently exposed.]

For example, public notification may be indicated if a cooling tower is identified as having uncontrolled Legionella growth so that community members who may have been exposed can monitor for signs and symptoms of LD. Conversely, if a hot tub within a fitness club is identified as having uncontrolled Legionella growth, then notification of club staff and members would enable all potentially exposed persons to monitor for signs and symptoms of LD, and public notification would likely be unnecessary. See other setting-specific modules for additional important information to include in media releases.]

- If someone resides in/visited [facility name] and developed symptoms of LD within 14 days of their visit, they should contact their healthcare provider and seek medical attention right away.



Routine Environmental Testing—Messaging Is Likely Indicated

Messaging Scenario:

- Routine test results show uncontrolled *Legionella* in a facility serving increased-risk populations
 - Messaging is likely indicated

[If test results are indicative of a system for which Legionella is uncontrolled in a facility serving increased-risk populations, then messaging is likely to be indicated. Messaging can emphasize the points below along with the audience-specific messages that follow.]

Overall messaging points:

- We are writing to inform you that [facility name] had positive environmental sample results for *Legionella* bacteria, which cause Legionnaires' disease (LD), during routine testing conducted at the facility.
- As of [date], no known cases of LD have been associated with [facility name].
- You are being informed about the positive routine test results [as required by law and] so [you/your facility] may take precautionary measures to limit [your/patrons'] potential exposure to *Legionella* until the situation is resolved.

Notes:

Include messaging from the corresponding setting-specific module for the key audience that addresses:

LD basics, potential sources of exposure, risk factors for LD, symptoms and treatment, action steps requested (e.g., seek medical help if develop symptoms), actions being taken, if any, and where to get additional information.

Additional messaging highlights in this table are intended to supplement messaging for key audiences in other relevant modules and should be used in conjunction with the messaging tables in other modules.

Audiences

Facility

- Test results indicate that *Legionella* is uncontrolled in your facility [as of x date].
- [Facility] should take immediate action to control *Legionella* growth through use of a water management program (WMP) (or instituting a WMP) [and to take additional actions identified by the public health agency].
 - *[Provide information about corrective actions to respond to Legionella]*
 - *[Identify immediate interventions that may be put into place (e.g., point-of-use filters, using bottled water, restricting water usage).]*
- [Your facility [should/may] contact the [state/local health agency] for assistance [and/or when the facility no longer tests positive for *Legionella*].
- If your become aware of any case of LD among [residents, patients, visitors, or staff members at your facility, contact [state/local health agency] immediately.

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Routine Environmental Testing—Messaging Is Likely Indicated

Messaging Scenario: Routine test results show uncontrolled *Legionella* in a facility serving increased-risk populations (*continued*)

Persons

[If possible, identify potential risk of exposure to systems and devices where Legionella is uncontrolled or poorly controlled and timing (if known).]

- If you begin to have symptoms of LD within 14 days of being at [facility name], see your physician immediately.

[For staff members: address whether PPE is recommended and for whom based on potential risk of exposure to systems and devices. See staff messaging tables in prior modules.]

Healthcare Providers and Facilities

[Healthcare providers associated with the facility with uncontrolled Legionella should be alerted so they can monitor their patients for Legionella exposure and LD symptoms. However, in the absence of associated cases or evidence of an ongoing outbreak, notification of providers at other facilities or health alerts is unlikely to be indicated.]

- If you become aware of any case of LD among patients, visitors, or staff members at [your facility name], contact [state/local health agency] immediately.

[If there is a public health investigation, see messaging tables for healthcare providers in other modules for directions to monitor for cases and test persons with LD symptoms.]

Other Agencies and Governments

[May inform other agencies and governments about positive routine environmental test results for Legionella as required by law, standard procedure, or voluntarily as public health partners.]

- If your [agency/jurisdiction] becomes aware of any cases of LD among persons who were exposed to [facility name], contact [state/local health agency] immediately.

Media and the Public

[Providing information to the media and the public about routine test results is often unnecessary but may be appropriate if testing indicates that Legionella growth is uncontrolled in a system or device to which unknown persons are likely to have been recently exposed.]

For example, public notification may be indicated if a cooling tower on a hospital campus is identified as having uncontrolled Legionella growth so that community members at increased risk for LD that may have been exposed can monitor for signs and symptoms of LD. Conversely, if a hot tub within a senior living community is identified as having uncontrolled Legionella growth, then notification of community members would enable all potentially exposed persons at increased risk of LD to monitor for signs and symptoms of LD, and public notification would likely be unnecessary. See other setting-specific modules for additional important information to include in media releases.]

- If someone resides in/visited [facility name] and developed symptoms of LD within 14 days of their visit, they should contact their healthcare provider and seek medical attention right away.