NTXEnviro
Indoor Air Quality Solutions

972-643-8379

MOLD CLEANUP GUIDE

- **Written By:**
  DENNIS B. BUTTS
  Licensed Mold Assessment Consultant
  TDLR License # MAC1317, Exp. 04/01/2027
- **Email:** dennis@ntxenviro.com

Contents

1.0 Introduction

Important Legal Disclaimer

The Texas Department of Licensing and Regulation (TDLR) regulates mold remediation in the state by administering the Texas Mold Assessors and Remediators Occupations Code and Administrative Rules. Additional information regarding the Texas Mold Program and the state mold statute can be found on their homepage at tdlr.texas.gov/mld/mld.htm.

This guide contains general information and best practices concerning mold remediation but should not be considered a formal Mold Remediation Protocol, which can only be developed by a licensed Mold Assessment Consultant (MAC). This mold cleanup guide has been based on literature and reference sources including: the Environmental Protection Agency (EPA), Texas Department of Licensing and Regulation Mold Rules, the Institute of Inspection, Cleaning and Restoration Certification (IICRC) S520 Standard and Reference Guide for Professional Mold Remediation, and the American Conference of Governmental Industrial Hygienists (ACGIH) Guidelines for the Assessment of Bioaerosols in the Indoor Environment.

Under Texas law, homeowners are exempt from mold licensing requirements and may remediate mold on their own property, regardless of the size of the affected area. The statute only applies when remediation is performed by someone other than the homeowner. If the amount of visible mold to be cleaned or removed is less than 25 contiguous square feet, a homeowner may hire any individual or company to do the remediation. If the affected area exceeds 25 contiguous square feet, the law requires the remediation to be performed by a licensed Mold Remediation Contractor (MRC).

When a licensed MRC is engaged, state law further requires that a licensed MAC first perform an inspection and issue a written remediation protocol (work plan) before work begins. Upon completion of the remediation, a post-remediation inspection (clearance) must confirm that the protocol and state clearance criteria have been met. A Certificate of Mold Damage Remediation (CMDR) may then be issued, which provides valuable documentation for future real estate transactions and satisfies seller disclosure requirements under Texas law.

The IICRC S520 also emphasizes that successful remediation must return the environment to a Condition 1 (normal fungal ecology). Clearance is based on:\n- Correction of the moisture source, No visible mold contamination, No mold-related odors, Normal moisture content in materials (e.g., wood ≤ 15%), and Verification sampling when required, showing results consistent with baseline or outdoor levels.

Finally, Texas law requires that every client receive the Consumer Mold Information Sheet (CMIS) published by TDLR. A copy is attached at the end of this document.

Why is mold growing in my home?

Molds are a natural part of the outdoor environment where they play an important role in breaking down organic matter such as leaves, wood, and plant debris. Indoors, however, mold growth should be prevented.

Mold reproduces through microscopic spores that are constantly present in both outdoor and indoor air. These spores can begin growing when they settle on surfaces that remain damp or wet for more than 24–48 hours. Common sources of moisture include roof leaks, plumbing leaks, condensation on cold surfaces, flooding, or high indoor humidity.

There are many types of mold, but all share one basic requirement: moisture. Without moisture, spores remain inactive and cannot colonize building materials. This is why the IICRC S520 Standard emphasizes that moisture control is the most effective strategy for mold prevention and remediation.

In short: mold will not grow indoors unless water or moisture problems are present. Correcting and controlling moisture is the key to eliminating and preventing mold problems (see Section 4.0 for prevention tips).

Can mold cause health problems?

Molds are not usually a concern indoors unless spores land on damp or wet materials and begin to grow. Once growth occurs, molds can release allergens, irritants, and, in some cases, potentially toxic substances (mycotoxins).

Exposure to mold may cause health problems in sensitive individuals. Common reactions include:

- Allergic responses such as sneezing, runny nose, red eyes, and skin rash.
- Asthma attacks in individuals with asthma who are allergic to mold.
- Irritation of the eyes, skin, nose, throat, or lungs in both allergic and non-allergic people.

Allergic reactions to mold are among the most frequently reported effects. These reactions may occur immediately or be delayed. While most reported effects fall into the allergic or irritant categories, some molds under certain conditions may present additional risks.

The Centers for Disease Control and Prevention (CDC), the Environmental Protection Agency (EPA), and the Institute of Inspection, Cleaning and Restoration Certification (IICRC S520) all emphasize that eliminating moisture and removing mold growth are the primary protective measures. Mold problems should not be ignored, especially when vulnerable individuals (infants, elderly, or those with compromised immune systems) are present.

This overview does not describe all possible health effects related to mold exposure. For more detailed information, consult a qualified health professional, your state or local health department, or the CDC's mold website (see Section 5.0 for more on health-related testing).

How do I get rid of mold?

It is not possible to eliminate all mold spores indoors, since they are a natural part of the environment and are always present in the air and in household dust. However, mold spores cannot grow unless they have access to moisture and a suitable surface.

The key to mold control is moisture control. According to the EPA and the IICRC S520 Standard, effective remediation requires two critical steps:

1. **Correct the moisture problem**. Identify and repair the source of water intrusion (leaks, condensation, humidity) so that the environment returns to a dry condition.
2. **Remove or clean contaminated materials**. Mold-damaged materials that cannot be cleaned must be discarded. Non-porous and some semi-porous materials can be cleaned using appropriate methods, such as detergent cleaning, HEPA vacuuming, and sanding/wire brushing of structural wood if needed.

Simply killing mold with chemicals is not sufficient. Dead mold can still trigger allergic reactions and must be physically removed. Likewise, cleaning without addressing the underlying moisture source will almost always result in mold returning.

In short: fix the water problem and remove the mold. Only by doing both can you achieve lasting results and return the environment to a Condition 1 (normal fungal ecology) as defined by IICRC S520.

Ten Things You Should Know about Mold

1. **Health Risks** - Exposure to mold may trigger allergic reactions, asthma attacks, and other respiratory complaints. Sensitive individuals (children, elderly, immune-compromised) may be at higher risk.
2. **Mold is Everywhere** - It is impossible to eliminate all mold spores indoors. The way to control mold growth is to control moisture.
3. **Fix Moisture First** - If mold is a problem in your home or school, you must clean up the mold and eliminate the water source to prevent recurrence.
4. **Repair Water Intrusion** - Fix leaks or water problems immediately to stop mold from returning.
5. **Control Humidity (30–60%)** Use:
    - Bathroom/kitchen/laundry exhaust fans vented outdoors
    - Air conditioners and dehumidifiers
    - Increased natural or mechanical ventilation
6. **Act Quickly** - Clean and dry wet materials and furnishings within 24–48 hours to prevent mold growth.
7. **Cleaning vs. Removal** - Non-porous surfaces can often be cleaned with detergent and water. Absorbent materials (e.g., ceiling tiles, drywall, carpet) may need to be discarded if mold-contaminated.
8. **Prevent Condensation** - Insulate cold surfaces (windows, piping, exterior walls, roofs, floors) to reduce moisture buildup.
9. **Choose Finishes Wisely** - Do not install carpeting in areas prone to constant moisture (e.g., basements, bathrooms, concrete floors with leaks/condensation).
10. **Mold Grows on Many Materials** - Given moisture, mold can grow on wood, paper, carpet, food, and virtually any building material.

2.0 Mold Cleanup

Tips and Techniques

Areas that remain damp or humid can be difficult to keep free of mold. Bathrooms, basements, and poorly ventilated spaces often require extra attention. If mold reappears in showers or other damp areas, improving ventilation (running an exhaust fan, opening a window) and increasing the frequency of cleaning will usually help minimize regrowth.

The following tips will help you manage small-scale mold problems. For larger areas, or when health-sensitive individuals are involved, consider hiring a licensed remediation professional. Please note that mold can leave behind stains or cosmetic damage even after cleaning, and some items cannot be fully restored.

- **Repair and Dry Quickly** - Fix plumbing leaks and other water problems immediately. Dry all materials and furnishings thoroughly.
- **Clean Non-Porous Surfaces** - Scrub mold from hard surfaces (tile, metal, glass, sealed wood, plastics) using a grease-cutting detergent and water. Rinse and dry completely.
- **Discard Moldy Porous Materials** - Items such as ceiling tiles, drywall, carpet, and insulation that are mold-contaminated generally cannot be salvaged and should be removed and replaced. Mold penetrates deeply into porous materials, making complete cleaning impractical.
- **Protect Yourself and Others** - Always use appropriate personal protective equipment (see Section 3.0 for PPE requirements) and isolate the work area when disturbing mold. This reduces airborne spread.
- **Do Not Paint or Caulk Over Mold** - Mold-contaminated surfaces must be cleaned and dried before applying paints, sealants, or caulks. Covering without removal will result in peeling and continued contamination.
- **Consult Specialists When Needed** - For items of high value or sentimental importance (e.g., furniture, artwork, rugs), consult professionals in restoration or conservation. Choose providers with proper credentials and references.

IICRC Note: The IICRC S520 Standard emphasizes that visible mold growth should be physically removed whenever possible, not just treated with chemicals. Cleaning should always be paired with moisture control to return the environment to a Condition 1 (normal fungal ecology).

General guidelines for successful mold remediation

1. **Clean or Dispose of Mold-Exposed Furnishings**
   - Permeable & Washable (clothing, bedding, linens) – Follow manufacturer's cleaning instructions. Use hot water wash and thorough drying (see Section 3.0 for PPE requirements).
   - Non-Permeable & Washable (wood, metal, plastic, glass, ceramics) – Scrub with a detergent solution and rinse thoroughly. If needed, follow with hydrogen peroxide-based cleaner. Note: Bleach is no longer recommended for routine remediation as it does not penetrate porous materials and may create harmful fumes (see Section 8.0 for common cleaning items).
   - Permeable but Not Washable (upholstered furniture, mattresses) – If contaminated, items are often best discarded. Carpets and upholstery may sometimes be salvaged through professional hot-water extraction if not severely damaged (see Section 5.0 Testing if sampling is needed before disposal).
2. **Remove Contaminated and Water-Damaged Materials**
   - When removing drywall, ceilings, cabinetry, or baseboards, inspect underlying cavities for hidden mold (see Section 6.0 on Hidden Mold).
   - Remove affected building materials at least 18 inches beyond visible growth whenever feasible.
   - Immediately seal removed materials in double 6-mil polyethylene bags before disposal to reduce cross-contamination (see Section 3.0 for PPE requirements).
3. **Remove Mold-Contaminated Insulation**
   - Any visibly contaminated or water-damaged insulation must be discarded (see Section 3.0 for PPE requirements).
4. **Inspect and Evaluate Carpet**
   - Remove and discard carpeting with visible mold growth, odors, delamination, or when drying/cleaning is not feasible.
   - Refer to EPA Cleaning Methods Table 2 for salvage criteria (see Section 7.0 EPA Tables).
5. **Clean Structural Surfaces**
   - For framing, flooring, joists, and other structural components:
     - Use sanding, grinding, or wire brushing combined with HEPA vacuuming (see Section 3.0 for PPE requirements).
     - Hydrogen peroxide-based cleaners and stain removers may be used.
     - If fungal growth cannot be completely removed, the material should be replaced.
6. **Clean Non-Porous Surfaces**
   - Clean glass, metals, or sealed/painted wood with detergent and water (see Section 3.0 for PPE requirements).
   - If water-damaged, replacement is often the best option.
7. **Wipe Down All Surfaces**
   - Use a detergent solution and disposable wipes or cloths.
   - HEPA vacuum all exposed surfaces to remove settled spores (see Section 3.0 for PPE requirements).
8. **Antimicrobial Use (Supplemental Only)**
   - After physical removal, wipe all exposed areas with an EPA-registered antimicrobial if appropriate.
   - Do not rely on antimicrobials as the sole remediation method.
   - Always follow the manufacturer's application instructions (see Section 8.0 Common Cleaning Items).
9. **Dry All Remaining Materials**
   - Use dehumidifiers, air movers, and negative air machines as appropriate (see Section 4.0 Moisture Prevention).
   - Verify that wood and structural materials are dried to ≤15% moisture content or within 4% of normal equilibrium levels.
10. **Waste Disposal**
    - All mold-contaminated debris must be double bagged in 6-mil polyethylene, sealed, and transported for disposal in an approved landfill (see Section 3.0 for PPE requirements).
    - Maintain containment until debris removal is complete to minimize spore release (see Section 2.0 Mold Cleanup for containment practices).

Cleanup and biocides

Biocides are chemical substances designed to kill living organisms, including mold. However, the EPA and IICRC S520 Standard both caution that the routine use of biocides or disinfectants is not recommended in mold remediation. The primary goal of cleanup is physical removal of mold-contaminated materials and correction of the moisture problem. Killing mold with chemicals does not address allergens, irritants, or dead spores, all of which can still cause health issues.

📌 **When Biocides May Be Considered**:

- Situations involving immune-compromised occupants.
- Limited, targeted use on non-porous surfaces where physical removal is difficult.
- As a supplemental measure only, after visible mold has been cleaned or removed.

⚠️ **Key Points**:

- It is generally neither possible nor desirable to "sterilize" an indoor environment. Background levels of spores will always remain, but they will not grow if moisture is controlled.
- Always follow manufacturer instructions for any disinfectant or antimicrobial product.
- Ensure proper ventilation and exhaust air outdoors when using chemicals.
- Never mix chlorine bleach with cleaning products containing ammonia or acids, as this can create toxic fumes.

✅ **IICRC Guidance**: Mold remediation should focus on source removal and moisture control. Antimicrobials may be applied, but only in a manner consistent with professional judgment and product labeling and never as a substitute for proper remediation.

Clearance Criteria - When Remediation or Cleanup is Finished

Remediation is considered complete only when the underlying water or moisture problem has been corrected and the affected areas meet post-remediation verification (PRV) criteria. According to the IICRC S520 Standard and EPA guidelines, the following conditions should be confirmed:

1. **Moisture Source Corrected**
   - The leak, condensation, or other source of water intrusion has been repaired.
   - Structural materials have been dried to ≤15% moisture content or within 4% of normal equilibrium.
2. **Mold Removal Completed**
   - All visible mold growth and mold-damaged materials have been removed.
   - No musty or mold-related odors are present.
   - *Note: Staining or cosmetic damage may remain even after successful remediation.*
3. **Visual and Surface Cleanliness**
   - No visible dust, debris, or mold contamination remains on cleaned surfaces.
   - All work areas have been HEPA vacuumed and wiped with detergent or an approved cleaning solution (see Section 3.0 for PPE requirements).
4. **Occupancy Safety**
   - Occupants can re-enter and use the space without mold-related health complaints or symptoms.
5. **Verification Testing (When Conducted)**
   - If air or surface sampling is performed, laboratory results should indicate that mold levels are within baseline/normal ranges (comparable to outdoor or non-impacted areas).

✅ In summary: Remediation is finished when the area has been dried, cleaned, and verified as free from visible mold, odors, and elevated moisture and when the indoor environment has returned to Condition 1 (normal fungal ecology) as defined by IICRC S520 (see Section 5.0 Testing for PRV sampling methods).

Please note

Dead mold can still produce allergens and irritants that may trigger reactions in sensitive individuals. For this reason, killing mold with chemicals alone is not sufficient. Mold-contaminated materials must be physically removed or thoroughly cleaned to restore the environment to a safe condition.

📌 **Key Point (EPA & IICRC S520)**:
Effective remediation = Moisture control + Physical removal. Simply applying a biocide does not meet professional or health-based remediation standards.

3.0 What to wear when cleaning moldy areas

3.1 PPE and Containment

It is important to take precautions to limit your exposure to mold and mold spores. The EPA Guidelines for Remediation of Building Materials with Mold Growth by Clean Water and the IICRC S520 Standard for Professional Mold Remediation both emphasize the importance of PPE, but they approach it differently.

- **EPA** provides guidance based on project size (square footage of visible mold contamination).
- **IICRC S520** bases PPE recommendations on risk level and environment condition rather than square footage, describing them as Minimum, Limited, and Full Protection.

The primary function of PPE is to protect workers from inhaling or contacting mold spores. Disturbing contaminated materials increases airborne exposure risks. Activities that stir up spores include:

- Breaking or removing moldy drywall or other porous materials
- Cutting or drilling into wall/ceiling cavities during inspection or remediation
- Stripping or peeling wallpaper
- Using high-velocity fans or improper drying methods

PPE Levels by Project Size (EPA) & Risk (IICRC S520)

- **Small Jobs (<10 sq. ft.) - Minimum Protection (EPA / IICRC)**
  - Disposable gloves
  - N95 respirator (NIOSH-approved)
  - Goggles without vent holes
  - Containment generally not required
- **Medium Jobs (10–100 sq. ft.) - Limited Protection (EPA / IICRC)**
  - Gloves and protective clothing (disposable coveralls or washable work clothing)
  - Half-face or full-face respirator with P100 cartridges
  - Goggles or integrated eye protection
  - Limited containment (poly sheeting and negative air if needed)
- **Large Jobs (>100 sq. ft.) - Full Protection (EPA / IICRC)**
  - Full-body disposable suit (e.g., Tyvek®) with sealed wrists and ankles
  - Head and foot coverings
  - Full-face powered air purifying respirator (PAPR) or full-face respirator with P100 cartridges
  - Double gloves for heavy removal work
  - Full containment with negative air machines and HEPA air scrubbers

Important Notes

- PPE should be donned and doffed carefully to avoid spreading spores.
- Disposable clothing should be bagged and discarded after use.
- Reusable respirators and goggles must be cleaned and decontaminated per manufacturer instructions.
- For specific cleanup procedures, see Section 2.0. For equipment, see Section 8.0.

3.2 PPE Components

Gloves

Gloves protect the skin from contact with mold. They also protect the skin from potentially irritating cleaning solutions. Long gloves that extend to the middle of the forearm are recommended. The material from which gloves are made should be suited to the type of materials being handled. If a biocide or a strong cleaning solution will be used, gloves should be made from:

- Natural rubber
- Neoprene
- Nitrile
- Polyurethane
- Polyvinylchloride (PVC)

If a mild detergent is being used, ordinary household rubber gloves are suitable. The routine use of biocides is not recommended.

Goggles

Properly fitted goggles or full-face respirators provide eye protection. Goggles must be designed to keep out dust and small particles. Safety glasses or goggles that have open vent holes are not acceptable.

Respirators

Respirators protect remediation workers from inhaling airborne mold, mold spores and dust. Three types of respiratory protection are described:

- Minimum
- Limited
- Full

Only respirators approved by the National Institute for Occupational Safety and Health (NIOSH) should be worn during mold remediation. These respirators must be used according to any applicable Occupational Safety and Health Administration (OSHA) regulations.

NIOSH Respirator Classifications

Unlike dust masks, respirators, whether disposable or reusable, must meet standards from the National Institute for Occupational Safety and Health (NIOSH). Classification meanings are listed below.

	FILTER EFFICIENCY		
OIL RESISTANCE	**95 (≥95%)**	**99 (≥99%)**	**100 (≥99.97%)**
N (Not resistant to oil)	N95	N99	N100
R (Resistant to oil)	R95	R99	R100
P (Oil proof; time-use limitations	P95	P99	P100

Disposable clothing prevents the transfer and spread of mold to clothing and eliminates skin contact with mold. When limited protection is warranted, disposable paper coveralls can be used. When full protection is required, a body suit of breathable material, such as TYVEK®, and mold-impervious disposable head and foot coverings should be used. All gaps, such as those around ankles and wrists, should be sealed.

4.0 Moisture and Mold Prevention and control tips

Moisture control is the key to mold control. Mold spores are always present in indoor and outdoor air, but they cannot grow unless sufficient moisture is available. By keeping buildings dry and controlling humidity, you can greatly reduce the risk of mold problems.

- **Act Quickly After Water Events** - When leaks or spills occur indoors, dry all wet or damp materials within 24-48 hours. Mold growth is unlikely if drying is completed within this timeframe (EPA/IICRC S500).
- **Maintain Roof Drainage** - Clean and repair roof gutters regularly to prevent water intrusion.
- **Protect the Foundation** - Ensure the ground slopes away from the foundation so that water does not pool or enter the structure.
- **Maintain HVAC Systems** - Keep air conditioning drip pans clean and drain lines unobstructed and flowing properly. Standing water in these areas can quickly lead to mold growth.
- **Control Indoor Humidity** - Keep indoor relative humidity below 60% (ideally between 30-50%). Use air conditioners and dehumidifiers as needed. A digital hygrometer (moisture meter) is inexpensive and widely available at hardware stores (see Section 5.0 Testing for tools to measure moisture and air quality).
- **Address Condensation Promptly** - If condensation forms on windows, walls, or pipes, dry the surface and correct the underlying humidity or insulation issue. Persistent condensation is a sign of excess humidity or inadequate ventilation.
- **Improve Ventilation** - Use exhaust fans in bathrooms, kitchens, and laundry areas. Vent dryers and other moisture-generating appliances to the outside. Increasing airflow helps reduce humidity and surface dampness.

IICRC Note: Prevention is not only about responding to water damage quickly, but also about design and maintenance. Ongoing leaks, chronic condensation, and poor ventilation should be corrected to prevent the environment from shifting from Condition 1 (normal fungal ecology) to Condition 2 or 3 (settled spores or active growth).

Actions that will help to reduce humidity:
Controlling indoor humidity is essential to preventing mold growth. The EPA and IICRC S500/S520 standards recommend maintaining indoor relative humidity below 60% (ideally 30-50%). The following actions will help:

- **Vent Moisture-Producing Appliances**
  - Always vent clothes dryers, stoves, bathrooms, and kerosene heaters to the outdoors.
  - Combustion appliances (e.g., gas stoves, kerosene heaters) generate water vapor and will increase humidity unless properly vented.
- **Use Mechanical Control**
  - Run air conditioners during warm months to cool and dehumidify the air.
  - Use portable or whole-house dehumidifiers when needed, especially in basements or damp climates.
- **Increase Airflow During Moisture-Generating Activities**
  - Run bathroom exhaust fans or open a window while showering and for at least 15 minutes afterward.
  - Use kitchen exhaust fans when cooking, washing dishes, or running the dishwasher.
  - Ventilate laundry areas to reduce trapped humidity.

Tip: Place inexpensive digital hygrometers in key areas (basement, kitchen, bathrooms, bedrooms) to monitor indoor humidity and adjust ventilation or dehumidification as needed.

Actions that will help prevent condensation:
Condensation occurs when warm, humid air contacts a cold surface (like windows, pipes, or exterior walls). Persistent condensation creates damp conditions that support mold growth (see Section 6.0 for hidden mold risks behind walls and furniture). To reduce the risk:

- **Lower Indoor Humidity**
  - Keep indoor relative humidity below 60% (ideally 30–50%). Use air conditioners and/or dehumidifiers as needed.
- **Improve Ventilation and Airflow**
  - Open interior doors and windows when practical to increase air circulation.
  - Run ceiling fans or portable fans to keep air moving, especially in areas prone to dampness.
- **Insulate Cold Surfaces**
  - Wrap cold-water pipes with pipe insulation.
  - Add insulation to exterior walls, attics, and crawlspaces to reduce cold surface exposure.
- **Maintain Comfortable Temperatures**
  - Keep indoor air temperature slightly higher in cool seasons to reduce surface cooling that leads to condensation.

⚠️ **IICRC Note**: Preventing condensation is an important part of maintaining a Condition 1 (normal fungal ecology) environment. Where condensation is chronic (e.g., basements, slab floors), both insulation and dehumidification may be necessary for long-term control.

Best Practice Clarifications

Moisture Source: Always repair water intrusion before or during remediation.
Removal First: Physically remove contaminated materials whenever feasible. Do not rely on chemicals alone.
No Bleach: Routine use of bleach or biocides is not recommended. Use detergent solutions, HEPA vacuuming, and approved antimicrobials (e.g., hydrogen peroxide-based cleaners) when appropriate.
Cross-Contamination Prevention: Double-bag debris in 6-mil poly, maintain negative air pressure in contained areas, and HEPA vacuum all exposed surfaces.
Documentation: Take photographs before, during, and after remediation. Record moisture readings and clearance test results. Keep these with the CMDR for resale or insurance purposes.

5.0 Testing or sampling for mold

Is sampling for mold necessary? In most cases, no. If visible mold growth is present, sampling is generally not required because the remediation process should be the same regardless of the mold type. As the EPA notes, sampling cannot be used to determine compliance with federal standards because no federal exposure limits for mold have been established.

However, sampling may be useful in certain situations:

- To verify that an area has been adequately cleaned after remediation (post-remediation verification).
- To assess areas where mold growth is suspected but not visible (e.g., wall cavities, HVAC systems).
- To establish baseline conditions for sensitive environments (schools, healthcare, childcare facilities).
- For documentation in real estate transactions, insurance claims, or legal disputes.

When sampling is performed, it should be carried out by professionals with specific training and experience in mold assessment. In Texas, this means a licensed Mold Assessment Consultant (MAC) when part of a regulated remediation project.

Laboratory analysis should follow validated methods recommended by the American Industrial Hygiene Association (AIHA), the American Conference of Governmental Industrial Hygienists (ACGIH), or other recognized organizations. According to the IICRC S520 Standard, data must be interpreted in context, considering building conditions, outdoor baseline levels, and potential sources of contamination.

⚠️ **Key Point**: Sampling is a tool, not a substitute for inspection. The absence of numerical federal standards means results must be interpreted carefully by qualified professionals, and remediation decisions should always prioritize visible conditions and moisture control.

Sampling Methods

1. **Spore-Trap Cassette Air Sample**

   Air sampling is one of the most common methods used to assess indoor mold conditions. A calibrated sampling pump draws a measured volume of air through a spore-trap cassette, which captures airborne particles, including mold spores, on a collection surface. The cassette is then analyzed under a microscope to determine:

   - The types of fungal spores present.
   - The concentration of spores per cubic meter of air.
   - A comparison between indoor and outdoor samples (outdoor air serves as the baseline).

   In some cases, specialized cassettes such as Via-Cell® Bio-Aerosol samplers or an N-6 impactor may be used to collect culturable samples. These allow laboratory growth and identification of viable fungi or bacteria in colony-forming units (CFU).

   📌 Why It's Used:

   - To help determine if indoor air has elevated mold levels compared to outdoors.
   - To verify whether remediation has reduced airborne spores to normal/background levels.
   - To investigate occupant health complaints or suspected hidden contamination.

   ⚠️ Limitations:

   - Air samples provide only a snapshot in time and results can vary with activity levels, cleaning, or ventilation.
   - Not all spores captured can be identified to the species level by spore-trap analysis.
   - Results must be interpreted by a qualified professional, ideally within the context of a full inspection (IICRC S520).

2. **Wall/Ceiling Cavity Sample**

   Wall and ceiling cavity sampling is used when mold contamination is suspected inside hidden spaces (such as wall voids or ceiling cavities) but not directly visible. A small access hole is drilled into the area being tested, and a plastic tube is inserted through which an air sample is drawn using a pump and spore-trap cassette. The captured particles are then analyzed under a microscope to determine the types and concentrations of fungal spores present.

   📌 When It's Used:

   - To investigate areas with a history of plumbing leaks, roof leaks, or water intrusion.
   - When stains, odors, or moisture readings suggest hidden mold growth behind finished surfaces.
   - As part of a post-remediation verification in cases where wall cavities were previously affected.

   ⚠️ Limitations and Precautions:

   - The sample represents only the specific cavity tested and may not reflect conditions elsewhere.
   - Drilling and sampling can disturb mold reservoirs, so containment and PPE are recommended when performing this type of test.
   - Interpretation requires expertise - elevated spore counts in cavities typically indicate active contamination and may trigger the need for material removal per IICRC S520.

3. **Dust Sample**

Dust samples are collected from carpets, furniture, or other porous materials to help evaluate the long-term history of mold exposure in a building. Unlike air samples, which provide a short-term "snapshot," dust can accumulate spores and fragments over time, giving a broader picture of microbial loading.

📌 Dust can be analyzed in several ways:

- Microscopic screen - Counts and identifies fungal structures present.
- Viable fungi or bacteria culture - Dust is incubated in the lab to determine what species can grow under controlled conditions. Results are reported in colony-forming units per gram (CFU/g).
- Molecular or spore count methods (when available) - Can quantify total fungal DNA or specific species.

📌 When It's Used:

- To assess average microbial load in fabrics or carpeting.
- To provide historical information in buildings with a history of leaks or chronic dampness.
- Sometimes used in research or litigation cases to demonstrate long-term exposure.

⚠️ Limitations:

- Dust samples may reflect past conditions and not the current state of the building.
- Results can be difficult to interpret because no federal standards exist for "normal" dust fungal levels.
- High results don't always mean an active problem - professional context (inspection findings, moisture data) is essential.
- According to IICRC S520, remediation decisions should not be based on dust sampling alone.

4. **Surface Sample**

Surface samples are used to identify mold growing directly on building materials or furnishings. They help confirm whether visible staining or discoloration is microbial in nature.

📌 Common collection methods include:

- Swab Samples – A sterile cotton swab is rubbed across a defined area, then sealed and labeled. Samples may be taken over a specific surface area (e.g., 1 square inch) or as a composite sample from several spots on the same material.
- Tape Lift Samples – A piece of clear adhesive tape is pressed onto the surface in question, then affixed to a microscope slide for analysis. Tape samples allow microscopic identification of fungal structures but cannot be cultured.

📌 When It's Used:

- To confirm whether visible growth on drywall, wood, carpet backing, or other surfaces is mold.
- To document contamination before remediation.
- To verify surface cleanliness after remediation (post-remediation verification).

⚠️ Limitations:

- Surface samples are qualitative — they identify mold types present but do not measure airborne concentrations.
- Tape samples cannot determine viability (living vs. dead).
- Results must be interpreted in context with the full inspection and other sampling, if performed.
- Per IICRC S520, visible mold growth should generally be treated as a remediation issue regardless of sample confirmation.

5. **Bulk Sample**

Bulk samples involve removing a small piece of building material (commonly around 2" x 2") that shows visible microbial growth or staining. The material is then sealed in a sterile container, labeled, and sent to a laboratory under chain-of-custody procedures for analysis.

📌 How It's Analyzed:

- Microscopic examination to identify fungal structures.
- Viable culture methods to determine species that can grow in the lab.
- In some cases, molecular methods (PCR/DNA analysis) may be used.

📌 When It's Used:

- To confirm whether discoloration on drywall, insulation, carpet, or other materials is mold.
- To document mold growth for insurance claims, legal cases, or remediation planning.
- Occasionally as part of post-remediation verification, when questionable material remains.

⚠️ Limitations & Considerations:

- Invasive - Requires removing part of the material, which may disturb spores.
- Not always representative - Only reflects the specific area sampled, not the entire building.
- Professional handling required - Per IICRC S520, bulk samples should only be collected by trained professionals using proper PPE and containment, since cutting into contaminated materials can release spores.

DIY Mold Surface Sample

Homeowners may collect their own simple surface samples to check for the presence of mold growth. A common method is the tape lift test:

1. Press a piece of clear scotch tape firmly onto the suspect surface.
2. Remove the tape and stick it to the inside of a clean Ziploc bag.
3. Seal the bag and send or deliver it to a licensed mold testing laboratory, such as the MoldLab in Carrollton, Texas.

The MoldLab provides instructions, chain-of-custody forms, and can typically return results within three (3) business days. They also rent air pumps and sell spore trap cassettes for homeowners who wish to perform air testing (see Section 2.0 Mold Cleanup for when professional remediation is required).

📌 **What to Expect from Results:**

- Tape samples can confirm whether visible staining is mold and identify common spore types.
- "Raw count" results (e.g., MoldLab code "9") indicate how many spores were seen under the microscope.
    - Small counts (around 10 spores or ~250 s/cm²) are often consistent with normal household dust.
    - Higher counts (50 spores or more, ~1100 s/cm²) may indicate direct sampling of an active mold source.

⚠️ **Important Limitations:**

- DIY sampling results may confirm the presence of mold but cannot substitute for a professional inspection or clearance test.
- Results are qualitative only - they don't measure air quality or occupant exposure.
- In Texas, only a licensed Mold Assessment Consultant (MAC) can design official sampling plans and interpret results for regulated projects.
- Per EPA and IICRC S520, visible mold growth should be cleaned or removed regardless of sample results.

6.0 Hidden mold

Suspicion of hidden mold

Sometimes mold problems are not immediately visible. You may suspect hidden mold if:

- The building smells moldy but no visible growth is seen.
- There is a known history of water intrusion or leaks.
- Occupants are reporting health complaints that may be linked to dampness or mold exposure.

Common locations of hidden mold include:

- The back side of drywall, wallpaper, or paneling.
- The top side of ceiling tiles.
- The underside of carpets and padding.
- Wall cavities near leaking or condensing pipes.
- Behind large furniture placed against exterior walls (where condensation can form).
- Inside HVAC ductwork or drip pans.
- Roof materials above ceiling tiles when roof leaks or poor insulation are present.

📌 **Inspection Considerations (EPA & IICRC S520):**

- Professionals often use moisture meters, thermal imaging cameras, and borescopes to identify hidden water damage and potential mold.
- Disturbing hidden mold reservoirs (e.g., peeling wallpaper, drilling walls) can release large amounts of spores. If hidden mold is strongly suspected, testing or remediation should be performed by trained professionals using containment and PPE.

⚠️ **Note**: Mold growth behind surfaces is typically classified as a Condition 3 environment in the IICRC S520 Standard, requiring professional remediation.

Investigating hidden mold problems

Hidden mold can be difficult to locate and investigating it must be approached with caution. Disturbing concealed mold sources may release large amounts of spores into the air and increase exposure risks. For example, removing wallpaper or cutting into water-damaged drywall can release spores if contamination exists on the underside.

📌 **Best Practices:**

- Use non-invasive methods first: look for staining, warping, or bubbling on surfaces; check for condensation; use your sense of smell for musty odors.
- Professionals may use tools such as moisture meters, thermal imaging cameras, or borescopes to identify moisture and likely mold reservoirs without unnecessary demolition.
- If destructive investigation is needed (e.g., cutting openings in drywall), proper containment and PPE should always be used to prevent spore release into clean areas.

⚠️ **Important Safety Note:**
If you suspect hidden mold, consider hiring a licensed professional. According to the IICRC S520 Standard, concealed contamination often qualifies as a Condition 3 environment, requiring controlled remediation practices (see Section 5.0 for appropriate sampling methods).

For More Information

For additional resources on mold, moisture control, condensation, and humidity prevention, visit the U.S. Environmental Protection Agency (EPA) Mold Resources page:
🔗 www.epa.gov/mold

This site provides homeowner guides, fact sheets, and technical references that complement the recommendations in this document.

7.0 U.S. EPA Cleaning Methods

These tables support recommendations in Section 2.0 (Mold Cleanup), For PPE levels, compare with Section 3.0 (What to wear when cleaning moldy areas).

U.S. EPA Table 1

Table 1: Water Damage - Cleanup and Mold Prevention	
*Guidelines for Response to Clean Water Damage within 24-48 Hours to Prevent Mold Growth**	
Water-Damaged Material†	**Actions**
Books and papers	- For non-valuable items, discard books and papers. - Photocopy valuable/important items, discard originals. - Freeze (in frost-free freezer or meat locker) or freeze-dry.
Carpet and backing - dry within 24-48 hours§	- Remove water with water extraction vacuum. - Reduce ambient humidity levels with dehumidifier. - Accelerate drying process with fans.
Ceiling tiles	- Discard and replace.
Cellulose insulation	- Discard and replace.
Concrete or cinder block - surfaces	- Remove water with water extraction vacuum. - Accelerate drying process with dehumidifiers, fans, and/or heaters.
Fiberglass insulation	- Discard and replace.
Hard surface, porous - flooring§ (Linoleum, ceramic tile, vinyl)	- Vacuum or damp wipe with water and mild detergent and allow to dry; scrub if necessary. - Check to make sure under flooring is dry; dry under flooring if necessary.
Non-porous, hard surfaces - (Plastics, metals)	- Vacuum or damp wipe with water and mild detergent and allow to dry; scrub if necessary.
Upholstered furniture	- Remove water with water extraction vacuum. - Accelerate drying process with dehumidifiers, fans, and/or heaters. - May be difficult to completely dry within 48 hours. If the piece is valuable, you may wish to consult a restoration/water damage professional who specializes in furniture.
Wallboard - (Drywall and gypsum board)	- May be dried in place if there is no obvious swelling and the seams are intact. If not, remove, discard, and replace. - Ventilate the wall cavity, if possible.
Window drapes	- Follow laundering or cleaning instructions recommended by the manufacture.
Wood surfaces	- Remove moisture immediately and use dehumidifiers, gentle heat, and fans for drying. (Use caution when applying heat to hardwood floors.) - Treated or finished wood surfaces may be cleaned with mild detergent and clean water and allowed to dry. - Wet paneling should be pried away from wall for drying.

* If mold growth has occurred or materials have been wet for more than 48 hours, consult Table 2 guidelines. Even if materials are dried within 48 hours, mold growth may have occurred. Items may be tested by professionals if there is doubt. Note that mold growth will not always occur after 48 hours; this is only a guideline.

These guidelines are for damage caused by clean water. If you know or suspect that the water source is contaminated with sewage, or chemical or biological pollutants, then Personal Protective Equipment and containment are required by OSHA. An experienced professional should be consulted if you and/or your remediators do not have expertise remediating in contaminated water situations. Do not use fans before determining that the water is clean or sanitary.

† If a particular item(s) has high monetary or sentimental value, you may wish to consult a restoration/water damage specialist.

§ The sub floor under the carpet or other flooring material must also be cleaned and dried. See the appropriate section of this table for recommended actions depending on the composition of the sub floor.

U.S. EPA Table 2

Table 2: Guidelines for Remediating Building Materials with Mold Growth Caused by Clean Water*			
Material or Furnishing Affected	**Cleanup Methods†**	**Personal Protective Equipment**	**Containment**
SMALL - Total Surface Area Affected Less Than 10 square feet (ft2)			
Books and papers	3	Minimum N-95 respirator, gloves, and goggles	None required
Carpet and backing	1, 3		
Concrete or cinder block	1, 3		
Hard surface, porous flooring (linoleum, ceramic tile, vinyl)	1, 2, 3		
Non-porous, hard surfaces (plastics, metals)	1, 2, 3		
Upholstered furniture & drapes	1, 3		
Wallboard (drywall and gypsum board)	3		
Wood surfaces	1, 2, 3		
MEDIUM - Total Surface Area Affected Between 10 and 100 (ft2)			
Books and papers	3	Limited or Full Use professional judgment, consider potential for remediator exposure and size of contaminated area	Limited Use professional judgment, consider potential for remediator/occupant exposure and size of contaminated area
Carpet and backing	1, 3, 4		
Concrete or cinder block	1, 3		
Hard surface, porous flooring (linoleum, ceramic tile, vinyl)	1, 2, 3		
Non-porous, hard surfaces (plastics, metals)	1, 2, 3		
Upholstered furniture & drapes	1, 3, 4		
Wallboard (drywall and gypsum board)	3, 4		
Wood surfaces	1, 2, 3		
LARGE - Total Surface Area Affected Greater Than 100 (ft2) or Potential for Increased Occupant or Remediator Exposure During Remediation Estimated to be Significant			
Books and papers	3	Full Use professional judgment, consider potential for remediator exposure and size of contaminated area	Full Use professional judgment, consider potential for remediator exposure and size of contaminated area
Carpet and backing	1, 3, 4		
Concrete or cinder block	1, 3		
Hard surface, porous flooring (linoleum, ceramic tile, vinyl)	1, 2, 3, 4		
Non-porous, hard surfaces (plastics, metals)	1, 2, 3		
Upholstered furniture & drapes	1, 2, 4		
Wallboard (drywall and gypsum board)	3, 4		
Wood surfaces	1, 2, 3, 4		

*Use professional judgment to determine prudent levels of Personal Protective Equipment and containment for each situation, particularly as the remediation site size increases and the potential for exposure and health effects rises. Assess the need for increased Personal Protective Equipment, if, during the remediation, more extensive contamination is encountered than was expected. These guidelines are for damage caused by clean water. If you know or suspect that the water source is contaminated with sewage, or chemical or biological pollutants, then the Occupational Safety and Health Administration (OSHA) requires PPE and containment. An experienced professional should be consulted if you and/or your remediator do not have expertise in remediating contaminated water situations.

†Select method most appropriate to situation. Since molds gradually destroy the things they grow on, if mold growth is not addressed promptly, some items may be damaged such that cleaning will not restore their original appearance. If mold growth is heavy and items are valuable or important, you may wish to consult a restoration/water damage/remediation expert. Please note that these are guidelines; other cleaning methods may be preferred by some professionals.

Cleanup Methods
Method 1: Wet vacuum (in the case of porous materials, some mold spores/fragments will remain in the material but will not grow if the material is completely dried). Steam cleaning may be an alternative for carpets and some upholstered furniture.
Method 2: Damp-wipe surfaces with plain water or with water and detergent solution (except wood —use wood floor cleaner); scrub as needed.
Method 3: High-efficiency particulate air (HEPA) vacuum after the material has been thoroughly dried. Dispose of the contents of the HEPA vacuum in well-sealed plastic bags.
Method 4: Discard - remove water-damaged materials and seal in plastic bags while inside of containment, if present. Dispose of as normal waste. HEPA vacuum area after it is dried.

Personal Protective Equipment (PPE)
Minimum: Gloves, goggles/eye protection and an N-95 respirator.
Limited: Gloves, half-face, or full-face air purifying respirators (APRs) equipped with P100 filter cartridges, disposable overalls, goggles/eye protection.
Full: Gloves, disposable full body clothing, head gear, foot coverings, full-face powered air purifying respirator (PAPR) equipped with a P100 filter.

Containment
Limited: Use polyethylene sheeting ceiling to floor around affected area with a slit entry and covering flap; maintain area under negative pressure with HEPA filtered fan unit. Block supply and return air vents within containment area.
Full: Use two layers of fire-retardant polyethylene sheeting with one airlock chamber. Maintain area under negative pressure with HEPA filtered fan exhausted outside of building. Block supply and return air vents within containment area.

8.0 Common Cleaning Items

Many of the items used during mold remediation can be obtained locally through hardware stores, home improvement centers, or equipment rental companies. ***NTX Enviro does not endorse any specific brand or product***; the following list is provided as a reference to help homeowners identify categories of items commonly used during cleanup. Products listed are examples only; always follow manufacturer instructions and safety data sheets (SDS).

Personal Protective Equipment (PPE) (see Section 3.0 for required levels of protection by project size)

- Safety glasses or sealed goggles
- Nitrile, natural rubber, polyurethane, neoprene, or PVC gloves
- N-95 respirator (minimum) or higher protection, depending on the size of the job
- Disposable coveralls (Tyvek® or similar) and shoe covers for larger jobs

Cleaning Agents (Detergents)

- General-purpose, grease-cutting detergents (e.g., Simple Green, Zep, other household brands)

Antimicrobial / Mold Control Products *(Supplemental Use Only)*

- Concrobium Mold Control
- Mold Armor Mold & Mildew Killer

⚠️ Note: EPA and IICRC S520 emphasize that antimicrobials should only be used as a supplement. The primary goal of remediation is physical removal of mold and contaminated materials.

Encapsulation Products *(When Specified in Protocols)*

- Kilz Mold & Mildew Sealer
- Zinsser Mold Killing Primer

⚠️ Note: Encapsulation should only be performed on clean, dry, and visibly mold-free surfaces after remediation is complete.

Equipment (available through rental companies such as Sunbelt Rentals)

- **HEPA Vacuum** - Must be designed so all air passes through a HEPA filter (99.97% efficiency at 0.3 microns). Operate and maintain per manufacturer's instructions (see Section 2.0 for proper structural cleaning steps).
- **Air Filtration Device (AFD)** - Can be configured as an air scrubber (recirculates filtered air) or a negative air machine (creates negative pressure and exhausts air outside).
- **Dehumidifier** - Removes excess moisture from air to help maintain indoor relative humidity below 60% (see Section 4.0 for moisture prevention practices).
- **Air Mover** - Provides high-velocity airflow to improve circulation, speed evaporation, and reduce drying times (see Section 4.0 for moisture prevention practices).

9.0 Plain-Language Homeowner Summary

1. Fix the water problem first (see Section 4.0 for moisture prevention).
2. DIY allowed if <25 sq. ft. For larger areas, hire licensed professionals.
3. Use PPE. At minimum: gloves, goggles, and N95 mask.
4. Contain the area. Prevent spores from spreading to clean areas (see Section 2.0 for detailed cleanup steps).
5. Remove and dispose of contaminated materials properly (see Section 2.0 for detailed cleanup steps).
6. Clean remaining surfaces with detergent, HEPA vacuuming, and approved antimicrobials (see Section 2.0 for detailed cleanup steps).
7. Dry thoroughly to prevent regrowth (see Section 2.0 for detailed cleanup steps).
8. Get clearance testing and a CMDR if professional remediation is performed.
9. Keep records for insurance and future property sales.

10.0 References

- **U.S. Environmental Protection Agency (EPA).** *Mold Resources.* Retrieved from https://www.epa.gov/mold
- **U.S. Environmental Protection Agency (EPA).** (2001). *Mold Remediation in Schools and Commercial Buildings (EPA 402-K-01-001).* Washington, DC.
- **Centers for Disease Control and Prevention (CDC).** *Mold: General Information.* Retrieved from https://www.cdc.gov/mold
- **Texas Department of Licensing and Regulation (TDLR).** *Mold Assessors and Remediators Program – Administrative Rules and Occupations Code.* Retrieved from https://www.tdlr.texas.gov/mld/mld.htm
- **Texas Department of Licensing and Regulation (TDLR).** *Consumer Mold Information Sheet (CMIS).* Retrieved from https://www.tdlr.texas.gov/mld/pdf/CMIS.pdf
- **Institute of Inspection, Cleaning and Restoration Certification (IICRC).** (2020). *ANSI/IICRC S500 Standard and Reference Guide for Professional Water Damage Restoration.* Vancouver, WA: IICRC.
- **Institute of Inspection, Cleaning and Restoration Certification (IICRC).** (2021). *ANSI/IICRC S520 Standard for Professional Mold Remediation.* Vancouver, WA: IICRC.
- **American Conference of Governmental Industrial Hygienists (ACGIH).** (1999). *Bioaerosols: Assessment and Control.* Cincinnati, OH: ACGIH.
- **American Industrial Hygiene Association (AIHA).** (2017). *Recognition, Evaluation, and Control of Indoor Mold.* Falls Church, VA: AIHA Press.

11.0 Consumer Mold Information Sheet

The official CMIS from the Texas Department of Licensing and Regulation is attached here for compliance. The Consumer Mold Information Sheet is available for download on the Texas Department of Licensing and Regulation website at www.tdlr.texas.gov/mld/pdf/CMIS.pdf. This Consumer Mold Information Sheet is provided as required by the Texas Department of Licensing and Regulation (see Section 1.0 for regulatory overview).

TEXAS DEPARTMENT OF LICENSING & REGULATION
P.O. Box 12157 • Austin, Texas 78711-2157
www.tdlr.texas.gov

CONSUMER MOLD INFORMATION SHEET

State rules require licensed mold assessors and remediators to give a copy of this Consumer Mold Information Sheet to each client and to the property owner, if not the same person, before starting any mold-related activity [16 TAC 78.70].

How does Texas regulate businesses that do testing for mold or that do mold cleanup?
The Department of Licensing and Regulation (TDLR) regulates such businesses in accordance with the Texas Occupations Code, Chapter 1958. Under the **Texas Mold Assessment and Remediation Rules (rules)** (16 Tex. Admin. Code, Chapter 78), all companies and individuals who perform mold-related activities in Texas must be licensed by TDLR unless exempt. (See Page 2 regarding owner exemptions.) Individuals must meet certain qualifications, have required training, and pass a state exam and criminal history background check in order to be issued a license. Applicants for a mold remediation worker registration must have training and pass a criminal history background in order to be registered by TDLR. Laboratories that analyze mold samples must also be licensed and meet certain qualifications. The rules set minimum work practices and procedures and also require licensees to follow a code of ethics. To prevent conflicts of interest, the rules also prohibit a licensee from conducting both mold assessment and mold remediation on the same project. While the rules regulate the activities of mold licensees when they are doing mold-related activities, the rules do not require any property owner or occupant to clean up mold or to have it cleaned up.

How can I know if someone is licensed?
A licensed individual is required to carry a current TDLR license certificate with the license number on it. A search tool and listings of currently licensed companies and individuals can be found at: https://www.tdlr.texas.gov/LicenseSearch/.

What is "mold assessment?"
Mold assessment is an inspection of a building by a **mold assessment consultant** or **technician** to evaluate whether mold growth is present and to what extent. Samples may be taken to determine the amount and types of mold that are present; however, sampling is not necessary in many cases. When mold cleanup is necessary a licensed mold assessment consultant can provide you with a **mold remediation protocol.** A protocol must specify the estimated quantities and locations of materials to be remediated, methods to be used and clearance criteria that must be met.

What is meant by "clearance criteria?"
Clearance criteria refer to the level of "cleanliness" that must be achieved by the persons conducting the mold cleanup. It is important to understand and agree with the mold assessment consultant prior to starting the project as to what an acceptable clearance level will be, including what will be acceptable results for any air sampling or surface sampling for mold. There are no national or state standards for a "safe" level of mold. Mold spores are a natural part of the environment and are always present at some level in the air and on surfaces all around us.

What is "mold remediation?"
Mold remediation is the cleanup and removal of mold growth from surfaces and/or contents in a building. It also refers to actions taken to prevent mold from growing back. Licensed **mold remediation contractors** must follow a mold remediation protocol as described above and their own **mold remediation work plan** that provides specific instructions and/or standard operating procedures for how the project will be done.

Before a remediation project can be deemed successful, a mold assessment consultant must conduct a **post-remediation assessment.** This is an inspection to ensure that the work area is free from all visible mold and wood rot, the project was completed in compliance with the remediation protocol and remediation work plan, and that it meets all clearance criteria that were specified in the protocol. The assessment consultant must give you a **passed clearance report** documenting the results of this inspection. If the project fails clearance,

Page **1** of **2**

further remediation as prescribed by a consultant will be necessary.

What is a Certificate of Mold Damage Remediation?

No later than the 10th day after a mold remediation project stop date, the remediation contractor must sign and give you a **Certificate of Mold Damage Remediation**. The licensed mold assessment consultant who conducted the post-remediation assessment must also sign the certificate. The consultant must truthfully state on the certificate that the mold contamination identified for the project has been remediated and whether the underlying cause of the mold has been corrected. (That work may involve other types of professional services that are not regulated by the mold rules, such as plumbing or carpentry.) Receiving a certificate documenting that the underlying cause of the mold was remediated is an advantage for a homeowner. It prevents an insurer from making an underwriting decision on the residential property based on previous mold damage or previous claims for mold damage. If you sell your property, the law requires that you provide the buyer a copy of all certificates you have received for that property within the preceding five years.

How is a property owner protected if a mold assessor or remediator does a poor job or damages the property?

The rules require licensees to have commercial general liability insurance in the amount of at least $1 million, or to be self-insured, to cover any damage to your property. Before hiring anyone, you should ask for proof of such insurance coverage. You may wish to inquire if the company carries additional insurance, such as professional liability/errors and omissions (for consultants) or pollution insurance (for contractors), that would provide additional recourse to you should the company fail to perform properly.

How is my confidentiality protected if I share personal information about myself with a company?

Under the code of ethics in the rules, to the extent required by law, licensees must keep confidential any personal information about a client (including medical conditions) obtained during the course of a mold-related activity. Further, you may be able to negotiate a contract to include language that other personal information be kept confidential unless disclosure "is required by law." However, licensees are required to identify dates and addresses of projects and other details that can become public information.

How do I file a complaint about a company?

Anyone who believes a company or individual has violated the rules can file a complaint with TDLR. For information on this process, call 1-800-803-9202, or complete the online complaint form at https://www.tdlr.texas.gov/complaints/.

Can property owners do mold assessment or remediation on their own property without being licensed?

Yes. A homeowner can take samples for mold or clean it up in the home without a license. An owner, or a managing agent or employee of an owner of a residential property is not required to be licensed, **unless** the property has 10 or more residential dwelling units. For non-residential properties, an owner or tenant, or a managing agent or employee of an owner or tenant, is not required to be licensed to do mold assessment or remediation on property owned or leased by the owner or tenant, **unless** the mold contamination affects a total surface area of 25 contiguous square feet or more. Please refer to 16 TAC §78.30 for further details on exceptions and exemptions to licensing requirements.

For more information about mold and the Texas Mold Assessment and Remediation Rules, contact:
Texas Department of Licensing and Regulation
Mold Assessors and Remediators
P.O. Box 12057, Austin, TX 78711
Phone: 512-463-6599 or 800-803-9202
www.tdlr.texas.gov