

HVAC & DUCT CLEANING BASICS

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How does your HVAC system and ductwork affect your health?

Your HVAC system and ductwork are the lungs of the home. Environmental pollutants like mold spores, fungal fragments, and mycotoxins can move from one area of the home to the other. When this happens, these pollutants are redistributed throughout your home, further cross-contaminating rooms and belongings.



Where do these pollutants come from?

The HVAC system and ductwork can be the source of the pollutants themselves, or the system can pull in contaminated air from other areas of the building and redistribute it throughout the home.



To clean or not to clean your air ducts?

When and how to clean your HVAC unit and ducts will depend on several factors, such as whether you are cleaning as part of general maintenance or in response to remediation or remodeling.

The extent to which your ducts can be cleaned depends on factors such as the age, type of ducts, condition, and source of the problem. For example, flex ducts are notoriously difficult to clean. In some cases, replacing your unit and/or ductwork might even be necessary or cheaper in the long run.

What should you know before you hire a duct cleaning company?

Before you hire a company, be clear on the goal and make sure to understand the type of ductwork and the problem you are trying to solve. Much like the mold remediation business, be careful not to fall victim to air duct cleaning scams. Consider hiring a NADCA or ACCA certified company.

Find a NADCA certified company https://nadca.com/find-a-professional

Find an ACCA certified company

https://www.acca.org/home





What does good duct cleaning look like?

The National Air Duct Cleaning Association (NADCA) states, "Air duct cleaning is a misnomer. In actuality, the entire HVAC system should be cleaned. Failure to clean all components of the system can result in recontamination of the entire system, thus minimizing the benefits of cleaning. Just as you wouldn't clean only half of your living room floor, you also would not want to clean only part of your HVAC system."

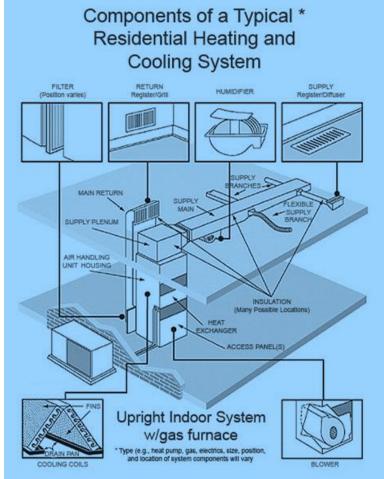
Components to be cleaned include:

- ✓ Air ducts
- ✓ Drain pan
- ✓ Coils
- ✓ Grills/Registers
- ✓ Air plenum
- √ Heat exchanger
- ✓ Air filter
- ✓ Air cleaner
- ✓ Blower motor and assembly

What are the components of cleaning?

NADCA identifies two key components:

- 1. Breaking contamination loose through use of agitation devices like:
 - ✓ Brushes
 - Air whips & compressed air nozzles
 - ✓ Skipper balls
 - ✓ Hand brushing
 - ✓ Contact vacuuming
- 2. Collecting contamination by placing the entire system under negative pressure. This includes:
 - ✓ Covering of vents
 - ✓ A vacuum source



Adapted from "Should You Have Your Air Ducts Cleaned?" by the Environmental Protection Agency, 1997 (https://www.epa.gov/sites/default/files/2014-07/documents/airducts.pdf). In Public domain.

A WORD OF CAUTION: Use caution when hiring companies that want to spray, fog, disinfect, or sanitize your ductwork. The added chemical exposure may be a health hazard. In most cases, it is likely illegal! Learn more from NADCA's position paper on Chemical Product Applications in HVAC Systems here.