



**Includes Model 8476 Event-Based™ Air Cleaning Programmable Thermostat**

# **Model 3210, 3310 & 3410 Owner's Manual**

## INTRODUCTION

Thank you for your recent Aprilaire® Air Cleaner purchase. We sincerely appreciate your business and are pleased to add your name to our growing list of customers. With this purchase, you have invested in the highest quality equipment currently available. Research Products Corporation is the largest manufacturer of central air cleaners and humidifiers and a recognized leader in the heating and air conditioning industry today.

Please be assured that in addition to product quality, we are also committed to performance as well as customer satisfaction.

**IMPORTANT:** Scheduled replacement of the Aprilaire® filtering media is necessary. See page 3 for details.

Now, please take a few minutes and read this booklet. This will familiarize you with the benefits you will receive from the equipment you just purchased and help you understand the routine maintenance that will be required. Be sure to register your warranty with us for our records and your protection.

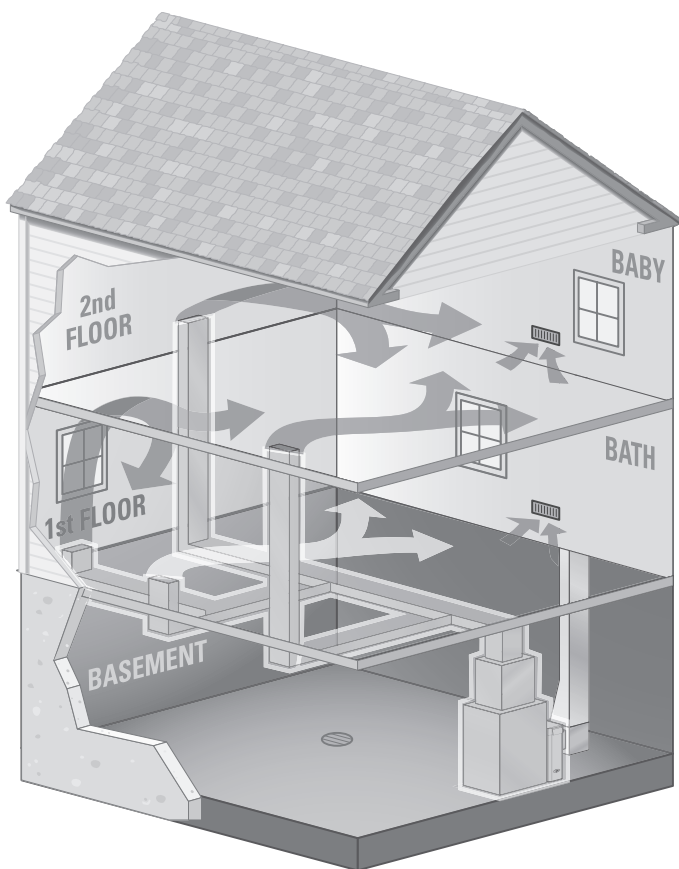
Your Aprilaire® Air Cleaner is an investment in healthful comfort for your family and protection for your home and furnishings. With this purchase, you have invested in an air cleaner that is many times more efficient than ordinary furnace or air conditioning filters with which you may be familiar. There are many benefits you may expect from your Aprilaire® Air Cleaner. This manual is furnished to acquaint you with these benefits, and with operation and maintenance information to insure the high level of performance this high efficiency air cleaner is designed to provide.

## PERFORMANCE

An Aprilaire whole-house air cleaner is installed by your heating and air conditioning contractor as one of the components in your heating and cooling system. It cleans the air that circulates through your home (see **Figure 1**).

When the heating or cooling equipment turns on, the air in your home travels through the registers and return duct(s) to the heating and cooling equipment where it is conditioned and sent back into the rooms of your house through the supply ducts. Small particles from numerous sources are suspended in your home's air, just as they are suspended in the air outdoors. The largest of these particles will eventually come to rest and appear as dust. Smaller particles may come to rest, but with even the slightest disturbance will re-suspend into the air. These particles are very small, and come from natural sources such as dust and pollen and from manmade sources such as tobacco smoke or exhaust. The air cleaner is installed on or near the furnace/air handler and removes the particles that travel with the air that circulates through your heating and cooling system. Removing these particles keeps the equipment components clean and more importantly removes particles from the air you breathe. Particles are measured in microns, which is a unit of measure used for very small things (1 micron = 1/25,400 inch). For reference, the diameter of a human hair is approximately 100 microns. **Figure 2** shows the size of various particles that can be found in the air.

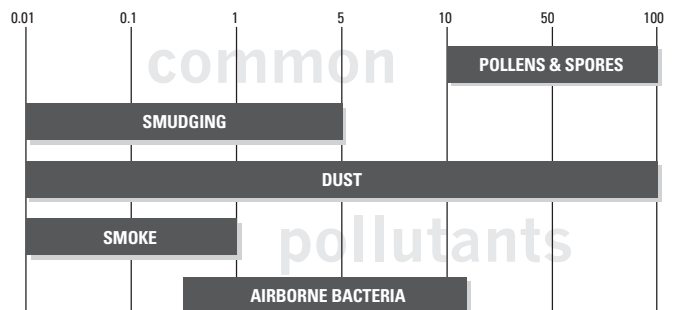
**FIGURE 1**



**FIGURE 2**

### Common Pollutants

Particle sizes in microns\* (1 micron = 1/25,400 inch)



\*American Society of Heating, Refrigeration and Air Conditioning Engineering Guide

## OPERATION

**Household dust** is typically an accumulation of particles in a size range of .01 micron up to 100 microns. **Pollens and spores**, which can aggravate allergy symptoms, are usually in the 10-100 micron size range.

The visible household dust particles, and nearly all pollen and spore particles, therefore, can be caught and permanently held, very easily, *if you can get them to the air cleaner*. With central high efficiency air cleaners, the blower of your heating/air conditioning system performs the air movement function.

Until now the air cleaner has been a passive component of your heating and cooling system; when the equipment turned on to heat or cool your home, the air cleaner was functioning. Your thermostat turns on your heating and cooling equipment and so, essentially, the thermostat determined when your air cleaner operated. Your model 3210, 3310, or 3410 air cleaner comes with an exclusive Model 8476 programmable thermostat with Event-Based™ Air Cleaning that allows you to clean your air when desired. Not only does Event-Based™ Air Cleaning allow you to actively clean the air, it will show you when the air cleaner is filtering the air and when it is time to change the

filter. Please see the Owner's Manual included with the Model 8476 Thermostat for a detailed explanation.

Many of the dust particles generated, while vacuuming, are so heavy they "fall" out of the airstream before they can be drawn out of your living area. This is why it is important to do household dusting several hours after vacuuming. Normally once the heavy particles "fall out", they are only reintroduced to the air by vacuuming, or similarly vigorous activity.

Where allergy symptoms, which are aggravated by pollens and spores, are a concern, continuous cleaning is strongly encouraged.

To recap, when removing household dust is the major benefit you are seeking, you should operate your air cleaner during and following periods when dust is being generated or "stirred up". For pollens and spores which aggravate an allergy condition, your cleaner must be operated continuously when these pollutants are in the environment. The air cleaner can only be effective when air containing the contaminants is drawn through the filtering media.

## MAINTENANCE

The only maintenance required is the periodic replacement of the disposable Aprilaire® Filtering Media which you can do in a few minutes. The frequency of replacement will vary with operation time, the number of particles generated in the home and is affected by: number of people and their activities, the amount of carpeting, pets, size of home, number of smokers, the pollution level of the area.

Aprilaire recommends replacing the media each year. However, if you do not run your blower continuously the media may last up to two years. Air conditioning systems larger than 3.5 tons, or heating systems larger than 130,000 BTUs per hour (1400 cfm), will require more frequent attention if operated continuously.

## CHANGING THE FILTER

Replace the filtering media with genuine Aprilaire SelfSeal™ filters, available from your installing contractor. **IMPORTANT:** Follow the step by step directions on the filter carton to ensure that it is installed in the proper orientation – the outlet side of the filtering media is the expanded metal.

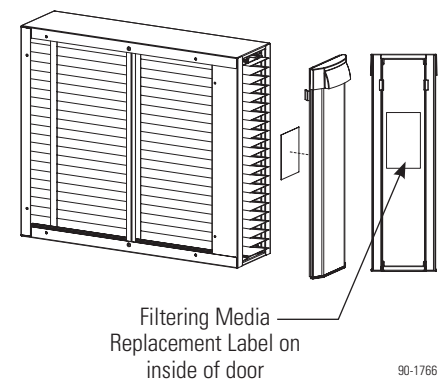
The model number for your replacement filtering media can be found on the label inside the air cleaner door (see **Figure 3**).

REPLACEMENT FILTER MEDIA		
Model	Best for Clean Home and Equipment Protection	Best for Healthy Home
3210	210	213
3310	310	313
3410	410	413

CHOOSE THE FILTER MEDIA THAT'S BEST FOR YOUR HOME AND YOUR FAMILY		
Captures	Model 210/310/410	Model 213/313/413
Dust	✓	✓
Pollen	✓	✓
Fungi	✓	✓
Mold	✓	✓
Pet Dander	✓	✓
Virus Size Particles		✓
Bacteria		✓
Virus Size Particles 0.3 - 1 Microns	N/A	75%
Dust 1 - 3 Microns	65%	90%
Pollen and Mold Spores 3 - 10 Microns	85%	90%

**FIGURE 3**

**IMPORTANT:** Turn the thermostat mode to off and the fan to auto before removing air cleaner door.



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## APRILAIRE 10 YEAR CLEAN COIL COMMITMENT

Aprilaire Air Cleaners are so effective at removing particles and contaminants that are harmful to your family and your HVAC equipment, we offer you this guarantee. Should your new indoor air conditioning coil require professional cleaning in the next 10 years while properly using an Aprilaire Air Cleaner, we will pay \$100 toward the cost of having the indoor coil cleaned by a licensed contractor.

This commitment applies to new HVAC equipment with a new indoor air conditioner coil (less than six months old) installed with an Aprilaire Air Cleaner. The Aprilaire Air Cleaner must be installed by a licensed HVAC contractor. The Aprilaire Air Cleaner must be properly maintained as per directions in the owner's manual including use of only Aprilaire brand media replacement.

For redemption details, please visit [www.aprilaire.com/cleancoil](http://www.aprilaire.com/cleancoil) or call 1-800-334-6011.

## FILTERING MEDIA REPLACEMENT RECORD

Date	Dealer Name

Date	Dealer Name

## LIMITED WARRANTY

Your Research Products Corporation Aprilaire Media Air Cleaner is expressly warranted for five (5) years from the date of installation to be free from defects in materials or workmanship, except, however, for the disposable media which will have to be replaced from time to time depending upon the use. Research Products Corporation's exclusive obligation under this warranty shall be to supply, without charge, a replacement for any part of the Media Air Cleaner which is found to be defective within such five (5) year period and which is returned not later than thirty (30) days after said five (5) year period by you or your original supplier to Research Products Corporation, Madison, WI 53701, together with the model number and installation date of the Media Air Cleaner.

THIS WARRANTY SHALL NOT OBLIGATE RESEARCH PRODUCTS CORPORATION FOR ANY LABOR COSTS AND SHALL NOT APPLY TO DEFECTS IN WORKMANSHIP OR MATERIALS FURNISHED BY YOUR INSTALLER AS CONTRASTED TO DEFECTS DISCOVERED IN THE AIR CLEANER ITSELF. IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE SHALL BE LIMITED IN DURATION TO THE AFORESAID FIVE YEAR PERIOD. RESEARCH PRODUCTS CORPORATION'S LIABILITY FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES, OTHER THAN DAMAGES FOR PERSONAL INJURIES, RESULTING FROM ANY BREACH OF THE AFORESAID IMPLIED WARRANTIES OR THE ABOVE LIMITED WARRANTY IS EXPRESSLY EXCLUDED. THIS LIMITED WARRANTY IS VOID IF DEFECT(S) RESULT FROM FAILURE TO HAVE THIS UNIT INSTALLED BY A QUALIFIED HEATING AND AIR CONDITIONING CONTRACTOR. IF THE LIMITED WARRANTY IS VOID DUE TO FAILURE TO USE A QUALIFIED CONTRACTOR, ALL DISCLAIMERS OF IMPLIED WARRANTIES SHALL BE EFFECTIVE UPON INSTALLATION.

Some states do not allow limitations on how long an implied warranty lasts or the exclusion or limitation of incidental or consequential damages so the above exclusion or limitations may not apply to you.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

For fulfillment of warranty parts, call Aprilaire at 1-800-334-6011.

## WARRANTY REGISTRATION

Visit us on-line at [www.aprilaire.com](http://www.aprilaire.com) to register your Aprilaire product. If you do not have on-line access, please mail a postcard with your name, address, phone number, product purchased and date of purchase to: Research Products Corporation, P.O. BOX 1467, Madison, WI 53701.

**YOUR WARRANTY REGISTRATION INFORMATION WILL NOT BE SOLD OR SHARED OUTSIDE OF THIS COMPANY.**



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