

## Section 2.13

# Air Handlers

The Network System supports up to eight air handlers, furnaces or rooftop furnaces. The standard functionality to support this type of equipment is single outputs for fan, heat, cool, humidify and dehumidify operation. Air handlers are configured when setting up thermostats; see **Section 3.4: Thermostat Setup 2**.

This section covers the following topics:

- Naming the service area
- Setting a timeout for manual fan runtime
- Setting up shutoff timeout
- Setting fan operation for humidification
- Setting fan operation for dehumidification

Before proceeding, make sure the following steps are complete:

- All Uponor Configuration Tool (UCT) software (A9090000) components are installed (**Section 1.5**).
- The computer is correctly connected to the Network System (**Section 1.6**).
- The installer is familiar with using UCT elements (**Section 1.7**).

**Note:** Remember to save all changes to flash memory. Changes not saved to flash will be lost if power is removed from the Primary Equipment Control (PEC) (A9012000). See **Section 5.1: Save to and Load from Flash**.

### Naming the Service Area

It is a best practice to name the area each air handler serves. Determine the air handler numbering from the position of the address jumper covering the pins on the Furnace and Air Condition Control (FAC) (A9011100). Be sure to know each air handler's numeric designation before naming the units.

Refer to the following steps to name the service area.

1. From the **Main Menu**, click the **Air Handlers** button shown in **Figure 2.13-1**. This displays the Air Handlers (AH) screen shown in **Figure 2.13-2** which shows the FACs that are online and communicating with the Router Main Control (RTR) (A9011000). **Figure 2.13-2** shows Air Handlers 1 and 2 are online.

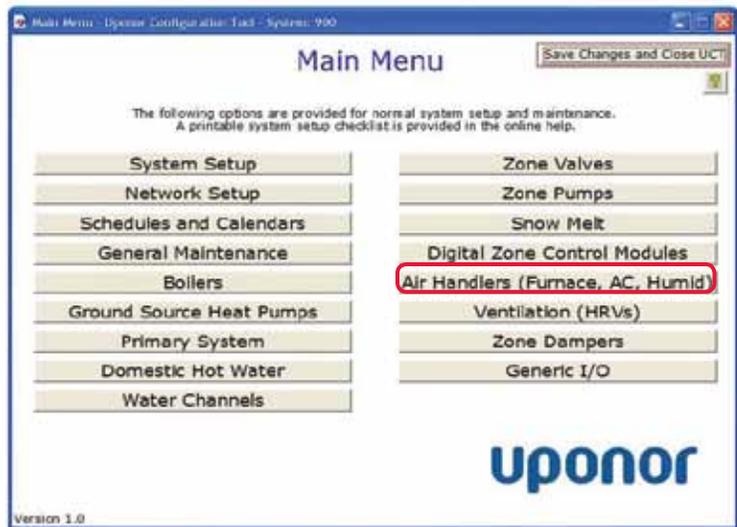
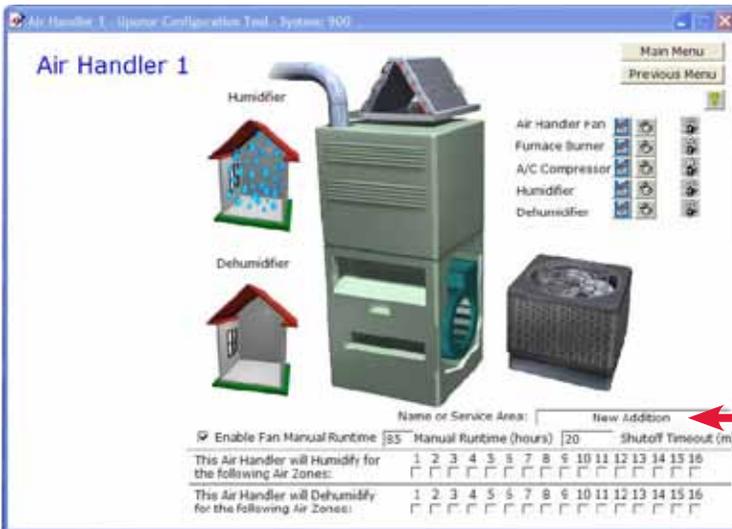


Figure 2.13-1: Main Menu Screen

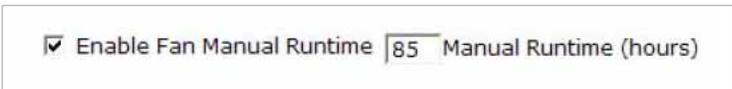


Figure 2.13-2: Air Handlers Status Screen

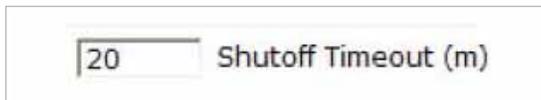
2. Click an **AH** button; refer to the red arrow in **Figure 2.13-2**. This will open an **Air Handler** screen; see **Figure 2.13-3** for an example.
3. In the Name or Service Area field, enter a name or description that clearly identifies the area the unit serves. The name can be up to 40 characters; do not use symbols. The name will initially display in pink text, then change to black when accepted by the RTR.
4. Repeat this process for other air handlers.



**Figure 2.13-3: Air Handler Screen**



**Figure 2.13-4: Fan Runtime Settings**



**Figure 2.13-5: Fan Shutoff Timeout Settings**

## Setting Timeout for Manual Fan Runtime

The Network System enables the installer to define an automatic timeout if the end user manually turns on a fan. If this feature is enabled, a fan that is turned on manually will automatically turn off after a set duration.

**Note:** This feature does not affect fan operation during air heating or cooling.

Refer to the following steps to enable manual fan runtime.

1. From the **Main Menu**, click the **Air Handlers** button to display the Air Handlers screen.
2. Click an **AH** button (this example uses AH 1), to display the Air Handler screen; see **Figure 2.13-3** for an example. **Figure 2.13-4** shows an enlarged view of the manual runtime settings.
3. Check the Enable Fan Manual Runtime box.
4. In the text box to the right, enter Fan Runtime in hours. The new value will initially display in pink text, then change to black when accepted by the RTR.
5. Repeat this process for other air handlers.

**Note:** If the text box for entering the runtime is gray and will not accept a value, the box to enable this feature is not checked.

## Setting up Shutoff Timeout

In some applications, it may be necessary to continue running a fan to fully dissipate the stored energy in a hot (or chilled) water coil.

Refer to the following steps to enable a fan shutoff timeout.

1. From the **Main Menu**, click the **Air Handlers** button to display the Air Handlers screen.
2. Click an **AH** button (this example uses AH 1), to display the Air Handler screen shown in **Figure 2.13-3**. **Figure 2.13-5** shows an enlarged view of the fan shutoff timeout settings.
3. In the text box to the left of Shutoff Timeout, enter the duration for the delay in minutes. The value will initially display in pink text, then change to black when accepted by the RTR.
4. Repeat this process for other air handlers.

## Setting Fan Operation for Humidification

The Network System can control humidification functions for air zones in the system. Configuration of air zones and humidification functionality occurs when setting up thermostats; see **Section 3.4: Thermostat Setup 2**. However, the following steps define which air handlers operate when various air zones require humidification (which is different from hydronic radiant zones).

**Note:** If the humidifier is a standalone unit and does not require fan operation, there is no need to check any of the boxes. The humidify contact on the FAC will close without turning on the fan.

Refer to the following steps to set up humidification for air zones.

1. From the **Main Menu**, click the **Air Handlers** button.
2. Click an **AH** button (this example uses AH 1) to display the Air Handlers screen shown in **Figure 2.13-3**. **Figure 2.13-6** shows an enlarged view of the humidification settings.
3. Check the boxes for the air zones for which the air handler will operate the fan for humidification.
4. Repeat this process for other air handlers.

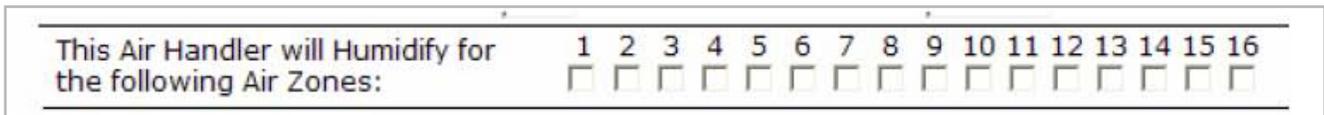
## Setting Fan Operation for Dehumidification

The Network System can control dehumidification functions for air zones in the system. Configuration of air zones and dehumidification functionality occur when setting up thermostats; see **Section 3.4: Thermostat Setup 2**. However, the following steps define which air handlers operate when various air zones require dehumidification (which is different from hydronic radiant zones).

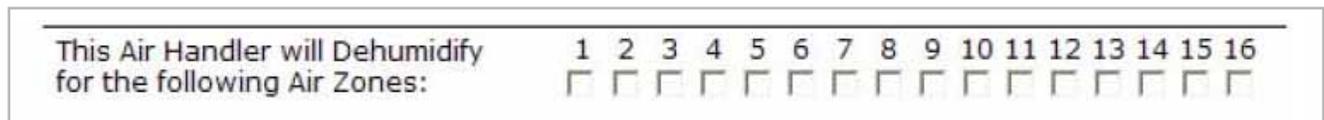
**Note:** If the dehumidifier is a standalone unit and does not require fan operation, there is no need to check any of the boxes. The dehumidify contact on the FAC will close without turning on the fan.

Refer to the following steps to set up dehumidification for air zones.

1. From the **Main Menu**, click on the **Air Handlers** button.
2. Click an **AH** button (this example uses AH 1) to display the Air Handler screen shown in **Figure 2.13-3**. **Figure 2.13-7** shows an enlarged view of the dehumidification settings.
3. Check the boxes for the air zones for which the air handler will operate the fan for dehumidification.
4. Repeat this process for other air handlers.



**Figure 2.13-6: Humidification Air Handler Settings**



**Figure 2.13-7: Dehumidification Air Handler Settings**

