

Applications:

Improves comfort by eliminating stagnant air Improves temperature and humidity control Distributes and mixes air Improves filtration system effectiveness Improves ventilation efficiency with air damper control

Ventilation control— simply smart.

Advanced Features

Ventilation and whole-house mixing

The AirCycler improves indoor air quality and comfort by operating a central fan during periods of thermostat inactivity. Should an outside duct be connected to the air handler return duct, the AirCycler allows a selectable minimum amount of ventilation. With a motorized outside air damper, the air flow can be limited to a programmable maximum.

Thermostat

A single-stage-heat-pump-compatible thermostat controls normal heating, cooling, and fan operation.

Data logger

Especially useful for energy guarantee programs, the AirCycler records diagnostic data to constantly evaluate system performance and usage patterns.

Pump Cycling for domestic hot water-based heating systems

During the non-heating season, the circulating pump operates automatically to avoid any potential microbial contamination of the system.

Combo STAT's system controller

For combination space and domestic hot water heating systems, an external digital temperature sensor gives priority to domestic hot water use during periods of high demand.



See the extensive application of this system in the U.S. Department of Energy's Building America Program. www.eren.doe.gov/buildings/building_america/

AirCyclers are protected by one or more of the following Patents and Patents pending: #5,547,017 & #5,881,806 AirCycler is a registered trademark of Lipidex Corporation.

Build it tight, ventilate it right!

Specifications:

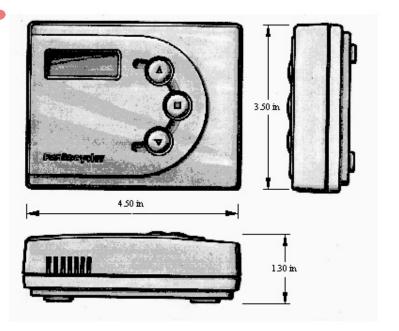
Input Voltage...... 20 to 30 VAC Current Draw...... 0.07 A Operating Temperature Range..... 0°C to 50°C Accuracy..... ±0.5°C Dead band..... ± 0.5 °C

Range, heating...... 12°C (55°F) to 24°C (75°F) Range, cooling...... 18°C (65°F) to 30°C (85°F)

Heat pump...... Single stage

Material..... ABS high impact plastic, UL 94V

Color......White



Principles of Operation

Fan recycling

The patented fan recycling control method improves indoor air quality by introducing and distributing ventilation air when the central heating or cooling system is inactive for long periods. Air is drawn through an outside air duct and distributed through the central system. Even without an outside air duct, the AirCycler can reduce stuffiness and temperature variations by mixing air throughout the house. If the thermostat has not activated the fan for a programmed period of time, the controller turns the fan on for a programmable period.

Outside air damper recycling

A motorized outside air damper, which is normally closed, can be installed in the outside air duct to limit infiltration when the central fan is off. The damper also limits the intake of ventilation air when the fan is on. The damper opens when the central system fan is energized, but closes if the fan stays on longer than the selected time period. It automatically closes when the fan is de-energized.

Pump cycling for combination space and domestic hot water heating systems

The AirCycler eliminates stagnation in the water loop by energizing the pump for one minute for every 24 inactive hours.

Combo STAT's domestic hot water priority

The combo STAT features an external digital temperature sensor for combination space and domestic hot water heating systems, giving priority to the hot water system while it recovers from high demand. If the hot

water supply falls below a programmable temperature when the thermostat calls for heat, the circulating pump is inhibited to allow for reheating. The sensor then remeasures the temperature, restarting the pump if the water has risen above the programmable higher temperature. Otherwise, the system will repeat the process until the water rises above the specified temperature, or until the pump has been inhibited for one hour.



LAGRIC SHIP-habure sensor

Models available:

AirCycler STAT Fan recycling and pump cycling thermostat with outside air damper control.

AirCycler combo STAT Thermostat with external temperature sensor for combo systems.

AirCycler FR Add fan recycling to an existing thermostat.

AirCycler FR-V Fan recycling and outside air damper control for existing thermostats.

