

Microprocessor Controls

Stand-Alone Unit Controller for Make-Up Air

- **Liquid crystal display with full-text readout**
- **On-board keypad for easy access and navigation**
- **7-day time clock with optional night setback**
- **Heating and cooling temperature lockouts**

Greenheck models DGX, IGX and MSX can be selected with a microprocessor controller. With the addition of the microprocessor control, these models have stand-alone control capability. All parameters within the microprocessor controller will be pre-programmed and tested and many of the parameters can be field adjusted based on end-user preferences and applications. The microprocessor provides unprecedented ease and flexibility during the unit commissioning processes and throughout the unit's operation.



Microprocessor Controller

Features and Options

The microprocessor controller features a built-in LCD screen with an integral push-button navigation keypad, providing an intuitive user-interface with a full-text display of menu screens, unit statuses, operating settings, and alarm conditions.

Monitoring and adjustment of the microprocessor's control point parameters are available directly via the microprocessor controller or the optional remote interface. The remote interface provides flexibility to the end-user since every control point parameter can be accessed without the need to access the unit.

The microprocessor controller also incorporates an integral programmable time clock allowing for a variety of sequencing needs to include: seven different occupancy schedules, holidays, unit shut down during unoccupied times, or unit cycle to maintain room set point (night setback).

The microprocessor controller also incorporates temporarily occupied status functionality. This feature can be accessed through the override function within the remote interface or through the use of a digital input (i.e., motion sensor, time clock, manual switch) providing further control flexibility for numerous applications.



Optional Remote Interface

Building Management System (BMS) Communication

With the simple addition of an optional BMS communication card, Greenheck's microprocessor controller can integrate into a BMS network. This feature provides end-user visibility and control of unit operation, status, and alarms via the BMS. It allows the ability to control as many or as few communication points as needed, providing nearly limitless control flexibility to fit the current and future needs of the end-user and the facility. The microprocessor controller is capable of communicating over the following protocols:

- BACnet® MSTP
- BACnet® IP
- LonWorks®
- Modbus® RTU
- Modbus® IP

Easy to Control, Easy to Follow, Easy to Update

Greenheck's microprocessor controller is preprogrammed from the factory for each specific application and includes every possible standard controller configuration. With this forethought and Greenheck's simple approach to equipment control, it allows for unprecedented field flexibility. Make a standard control addition or change through a simple configuration code adjustment utilizing the onboard keypad and LCD without the need for additional equipment or factory reprogramming.

Suppose a unit ordered with the supply fan controlled by building pressure now requires CO2 control. Greenheck's microprocessor offers a simple solution. A new factory-supplied CO2 sensor with a configuration code adjustment allows for seamless updating. It has never been easier!

With the addition of the microprocessor controller, Greenheck and its sales partners can now offer single-source control capabilities and solutions for countless make-up air applications.

