Hydroponics and Aquaponics

You'll find our high-performance advanced devices are a perfect fit for the fastest growing segments in the industry. The EnviroSTEP and VersiSTEP are highly capable controls ready to manage hydroponic, aquaponic and systems that integrate both methods of production. With irrigations based on time, light levels and vapor-pressure gradient (VPG) abilities, everything you need it is included. Speaking of included, you'll receive your precision aspirated temperature sensor and cable at no extra cost.



FEATURES

Whether you use ebb and flow, trough or grow your crop in ponds, Wadsworths' EnviroSTEP and VersiSTEP advanced controllers have got you covered.

- Arrives preprogrammed and ready to go; fine tune settings to suit your environment
- 3 setpoint periods day, night and DIF
- Ramping allows for gentle transition between set point periods and saves fuel
- Large display screen with menu-driven choices and graphing functions
- Keypad for easy operation
- 12-40 relay outputs with manual override switches
- · Analog input channels for connecting light, CO2, RH and temperature sensors
- Digital detector channels sense precipitation, wind speed and wind direction
- Records the status of all inputs and outputs in 15-minute increments
- · Alarm outputs: temperature, RH and power failure
- Replaceable 10 amp DPDT relays can operate a wide variety of equipment. These relays reduce the cost of your contactor panel
- Durable corrosion-resistant cabinet with locking door protects your control

We use the EnviroSTEP to supply water in our

hydroponic lettuce production. The feature I find most useful is the VPG (Vapor Pressure Gradient), which uses temperature and humidity to estimate when plants will need water, and at what point we need to pulse our pumps. That way we are providing water only when the plants need it, and that in turn saves energy costs.

> **CHRIS POWELL** Good Harvest Farms Strasburg, PA

We grow tilapia and leafy greens for schools and hospitals in the area. Originally we had a STEP 50 but upgraded to an EnviroSTEP because we needed more control. We use the EnviroSTEP for our lights and for better control over the temperature.

It gives us improved energy efficiency.

CHRISTOPHER MEUNIER KP Simply Fresh North Freedom, WI

The flexibility of the EnviroSTEP allows us to

meet our environmental control and irrigation needs for our solar photovoltaics power system integrated high tunnel research with a single control system. We use the EnviroSTEP which can regulate heating, cooling and fertigation processes. The controller monitors indoor and outdoor climate conditions. StepSaver software enables remote access to the controller, allowing for monitoring conditions offsite.

MURAT KACIRA

Associate Professor, Department of Agricultural and Biosystems Engineering University of Arizona

