



## ■ TSU

### Standalone Wall-Mount Controller

Neptronic's TSU is a standalone wall-mount controller with a built-in temperature sensor and scheduler. The unit is designed for straightforward and accurate control of fan coil units and heating/cooling equipment. Its field configurable algorithms enable versatile implementation of required control sequences.

The TSU also provides an optional humidity sensor input for simple and accurate humidity control and provides a dehumidification sequence compensated by auto activation of reheat output. This controller is also available with an additional PIR motion detection sensor, providing more functionality for the terminal device.

#### APPLICATIONS

The TSU is the ideal solution for a variety of applications that require accurate control, such as:

- Fan coil units (2 or 4 pipes)
- Multi-stage heating/cooling equipment

#### MODELS

Models	Temp.	RH	PIR
● TSU00-110	•		
● TSU00-111	•	•	
● TSU00-114	•		•
● TSU00-115	•	•	•

## STANDARD FEATURES

- Fan control: 1, 2, or 3-speed (auto/on), or analog (ECM)
- Optional internal/external humidity sensor input for simple and accurate humidity control
- Dehumidification sequence compensated by auto activation of reheat output
- Real time clock (RTC) with 24-hour backup
- 7-day programmable schedule
- Precise temperature control with configurable PI (Proportional-Integral) function
- Selectable internal or external temperature sensor
- Low limit set protection (10°C / 50°F)
- Occupancy and night set back (NSB) mode
- Selectable direction on outputs
- Option of pulse/floating/on-off output on binary outputs
- Internal/external occupancy input
- Compressor anti-cycling delay (configurable)
- $\Delta T$  control (on request)
- Dimensions: 124mm x 83mm x 20mm (4.88" x 3.25" x 0.78")
- Made in Canada

## OPTIONAL FEATURES

- Humidity sensor for RH control
  - Sensor Range: 5 to 95% RH
  - Control Accuracy:  $\pm 3.5\%$  RH
- PIR sensor for energy saving functions
  - Detection Angle: 100°
  - Detection Distance: 4m (13ft)

## INPUTS/OUTPUTS

- 2 Configurable Universal Inputs (0-10Vdc, 10K $\Omega$  sensor, dry contact)
- 5 Configurable Binary Outputs (OptoFET, 250mA max)
- 2 Configurable Analog Outputs (0-10Vdc, adjustable)

## RELAY INTERFACE BOARD (OPTIONAL PERIPHERAL)

- 240/120 Vac
- 3, 4 or 5 contacts
- Metal box with secure 4-point mounting (models without enclosure also available)
- Equipped with built-in transformer (12VA max)

Model	Voltage	Contact Ratings		Number of Outputs
		Resistive	Motor	
CCC713-07	120 Vac	7 A	1/4 HP	3
CCC714-07				4
CCC715-07				5
CCC723-07	240 Vac	7 A	1/4 HP	3
CCC724-07				4
CCC725-07				5

