08

Temperature Controller

Pulse Heat Pressing Temperature Controller DTH

High-Speed, High-Precision Temperature Control

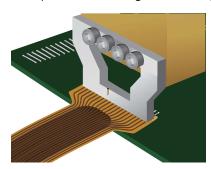
The DTH series is equipped with fast and stable temperature measurement capabilities and provides precise temperature control through PID control and DC pulse output. Supports efficient computing and data analysis with built-in algorithms and large storage capacity. It is an excellent tool for pulse heat pressing and ensures high processing speed, stable yield, and lower consumption of soldering materials.

- DC pulse output ensures stable temperature control
- 500 Hz high-speed sampling for precise temperature control
- PID auto-tuning complete in 10 seconds
- · User-friendly interface
- · Detailed records for easy tracking
- Supports remote monitoring to realize smart manufacturing



Applications

Flexible flat cable (FFC) bonding, PCB wire bonding, Conducting wire bonding, Plastic heat pressing, Solar panels conducting wire bonding, Type C/USB cable bonding



Flexible flat cable (FFC) bonding

PCB wire bonding

Solar panels conducting wire bonding

Conducting wire bonding

Plastic heat pressing

Type C/USB cable bonding



Temperature Controller

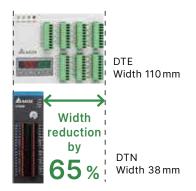
Multi-Loop Modular Temperature ControllerDTN

Thin-Type Design and Multi-Point Temperature Control

- · Thin-type design saves horizontal mounting space
- Supports Ethernet communication for stable and real-time multi-loop parameter control
- Modular design allows easy replacement and extension up to 64 PID control loops for flexible applications

Thin-Type Design Saves Horizontal Mounting Space

- Reduces width by 65% compared to the DTE Series
- Saves horizontal mounting space and overcomes cabinet size limitation





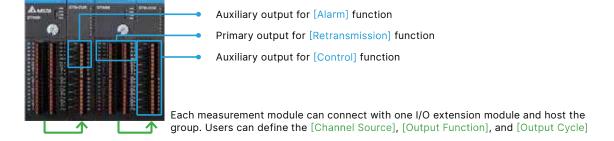
Fast Module Connection via RS-485 Communication

- Max. Baud rate: 115,200 bps
- Supports Modbus RTU/ASCII
- Offers external switches for communication protocol and address set up, easy to install and maintain



Various Extension Modules for Flexible Applications

- The DTN Series consists of measurement, I/O extension, and Ethernet modules.
- One measurement module provides an up to 8-point control loop, and a host group controls up to 64 points
- The second output and alarm point can be easily set as any address in the I/O extension module for convenient on-site wiring and various applications



Applications

Rubber and plastics, Semiconductor, Solar energy, Glass manufacturing, and more

Advanced Multi-Loop Modular Temperature Controller DTM

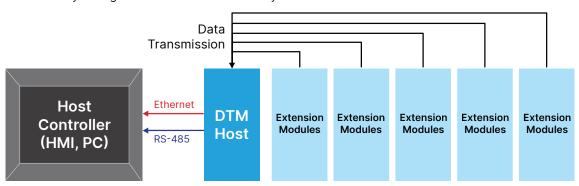
Quick Start and a User-Friendly Interface

- · Modular design for easy wiring
- Various extension modules for various applications
- Data collection by CPU for higher data exchange efficiency
- Supports RS-485 and Ethernet communication, and multi-point temperature control (max. 64-CH control loops for a DTM group)
- User-defined communication addresses
- · Complete isolation between channels



Data Collection by Host

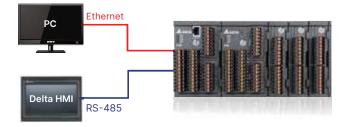
 The DTM host collects data from all extension modules at any time and uploads to the master controller immediately for higher communication efficiency



The host sends all data from the DTM group to the host controller.

RS-485 and Ethernet introduction

- Ethernet: supports Ethernet/IP communication
- RS-485
 - Max. Baud rate 115,200 bps
 - Supports ASCII and RTU
 - Offers external switches communication protocols, address setup, and easy installation and maintenance



Applications

Rubber and plastics, Semiconductor, Solar energy, Glass manufacturing, and more



Temperature Controller

Advanced Intelligent Temperature Controller DT3

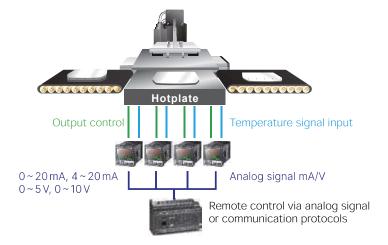
High Speed, High Precision, High Performance - Multifunction Temperature Controller

- Power supply: 80 ~ 260 V_{AC} 50/60 Hz, 24 V_{AC} ± 10% 50/60 Hz, 24 V_{DC} ± 10%
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- Platinum resistance sensor: Pt100, JPt100
- Resistance temperature detector: Cu50, Ni120
- · Sensor input sampling rate: 0.1 second
- Control output: relay, 4~20mA current, voltage pulse, 0~10 V voltage
- Control mode: ON/OFF, PID, PID program, manual, self-tuning, fuzzy control
- · Modbus communication: optional
- Dual control output for heating and cooling control
- Heater burnout alarm
- · PID program control provides 16 patterns with 16 steps each
- IP66 ingress protection rating on front panel and CE, UL certification



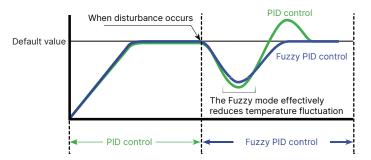
Remote Control

 Temperature settings via analog output of host controller



Various Control Modes

- Auto-tuning
- Fuzzy
- Manual
- ON/OFF
- · PID process control
- Self-tuning



Applications

Solar panel manufacturing, Food & beverages packaging, Pharmaceuticals, Semiconductor, Rubber and plastics, High-tech electronics industries, HVAC

Intelligent Temperature Controller DTK

- Power input: 100~240 V_{AC}, 50/60 Hz
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- · Platinum resistance: Pt100, JPt100
- RTD: Cu50, Ni120
- Output: Relay, current 4~20mA, pulse voltage
- · Control mode: ON/OFF, PID, manual
- Modbus communication (optional)
- 1 set of alarm output (2 sets of alarm outputs are optional), 9 alarm modes
- IP66 ingress protection rating on front panel
- Panel size options: 48 × 48, 48 × 96, 72 × 72, 96 × 96 (mm)



- Power input: 100~240 V_{AC}, 50/60 Hz
- · Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- · Platinum resistance: Pt100, JPt100
- RTD: Cu50
- · Output: Relay, current, pulse voltage
- · Control mode: ON/OFF, PID, manual
- Modbus communication (optional)
- 2 sets of alarm outputs, 13 alarm modes
- Dimensions: 48 × 48, 48 × 96, 72 × 72, 96 × 48, 96 × 96 (mm)
- IP65 protection



Advanced Temperature Controller DTB

- Power input: 100 ~ 240 V_{AC}, 50 / 60 Hz, 24 V_{DC} ± 10%
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- Platinum resistance: Pt100, JPt100
- Analog input: 0~5V, 0~10V, 0~20mA, 4~20mA, 0~50mA
- Output: Relay, current 4~20mA, pulse voltage, analog voltage 0~10 V
- Control mode: ON/OFF, PID, manual, PID process control
- · Built-in Modbus communication
- 2 sets of alarm outputs, 18 alarm modes
- Dimensions: 48 × 24, 48 × 48, 48 × 96, 96 × 96 (mm)
- · IP65 protection





Temperature Controller

Modular Temperature Controller DTC

- Power input: 24 V_{DC} ± 10%
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- · Platinum resistance: Pt100, JPt100
- Analog input: 0~5V, 0~10V, 0~20mA, 4~20mA, 0~50mA
- Output: Relay, current 4 ~ 20 mA, pulse voltage, analog voltage 0 ~ 10 V
- · Control mode: ON/OFF, PID, manual, PID process control
- · Built-in Modbus communication
- · 2 sets of alarm outputs, 13 alarm modes



Multi-Channel Modular Temperature Controller DTE

- Power input: 24 V_{DC} ± 10%
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK (supports max. 8 sets of inputs)
- Platinum resistance: Pt100, JPt100 (supports max. 6 sets of inputs)
- RTD: Cu50, Ni120
- Output: Relay, current 4~20 mA, pulse voltage, analog voltage 0~10 V
- · Control mode: ON/OFF, PID, manual, PID process control
- · Built-in Modbus communication
- · 2 sets of alarm outputs, 13 alarm modes



Valve Controller DTV

- Power input: 100 ~ 240 V_{AC}, 50/60 Hz, 24 V_{DC} ± 10%
- Thermocouple: K, J, T, E, N, R, S, B, L, U, TXK
- Platinum resistance: Pt100, JPt100
- Analog input: 0~5V, 0~10V, 0~20mA, 4~20mA, 0~50mA
- · Output: Relay
- Control mode: ON/OFF, PID, manual, PID process control
- · Built-in Modbus communication
- · 2 sets of alarm outputs, 17 alarm modes
- Dimensions: 48 × 96, 96 × 96 (mm)
- IP65 protection

