

## Surface temp Click



PID: MIKROE-4205

**Surface temp Click** is high accuracy digital temperature sensor Click board™, offering breakthrough performance over a wide industrial range. It is equipped with the [ADT7420](#) - an accurate 16-Bit Digital I2C temperature sensor from [Analog Devices](#). It features high temperature accuracy, ultralow temperature drift (0.0073°C), fast first temperature conversion on power-up, no temperature calibration/correction required, and more. This makes the Surface Temp Click board™ a great choice for RTD and thermistor replacement, medical equipment, food transportation and storage, environmental monitoring, HVAC, and other applications.

Surface temp Click is supported by a mikroSDK compliant library, which includes functions that simplify software development. This Click board™ comes as a fully tested product, ready to be used on a system equipped with the mikroBUS™ socket.

Mikroe produces entire development toolchains for all major microcontroller architectures.

Committed to excellency, we are dedicated to helping engineers bring the project development up to speed and achieve outstanding results.



ISO 27001: 2013 certification of informational security management system.  
 ISO 14001: 2015 certification of environmental management system.  
 OHSAS 18001: 2008 certification of occupational health and safety management system.



ISO 9001: 2015 certification of quality management system (QMS).

## Specifications

Type	Temperature
Applications	RTD and thermistor replacement, Thermocouple cold junction compensation, Medical equipment, Industrial control and test, Food transportation and storage, Environmental monitoring and HVAC, Laser diode temperature control. Programmable interrupts. Low power.
On-board modules	ADT7420
Key Features	High accuracy digital temperature sensor offering breakthrough performance over a wide industrial range. 16-bit ADC to monitor and digitize the temperature to 0.0078°C resolution.
Interface	I2C
Compatibility	mikroBUS
Click board size	M (42.9 x 25.4 mm)
Input Voltage	3.3V or 5V

## Resources

[mikroBUS™ Standard specification](#)

[Libstock: mikroSDK](#)

[Click board catalog](#)

[Click boards™ Standard Page](#)

## Downloads

[Surface Temp click example on Libstock](#)

[Surface Temp click 2D and 3D files](#)

[Surface Temp click schematic](#)

[ADT7420 datasheet](#)

Mikroe produces entire development toolchains for all major microcontroller architectures.

Committed to excellency, we are dedicated to helping engineers bring the project development up to speed and achieve outstanding results.



ISO 27001: 2013 certification of informational security management system.  
 ISO 14001: 2015 certification of environmental management system.  
 OHSAS 18001: 2008 certification of occupational health and safety management system.



ISO 9001: 2015 certification of quality management system (QMS).