

Time-saving embedded tools

MIKROELEKTRONIKA D.O.O, Batajnički drum 23, 11000 Belgrade, Serbia VAT: SR105917343 Registration No. 20490918 Phone: + 381 11 78 57 600 Fax: + 381 11 63 09 644 E-mail: office@mikroe.com www.mikroe.com





## PID: MIKROE-4697

**RTC 12 Click** is a compact add-on board that measures the passage of time. This board features the DS1343, a low-current SPI-configurable real-time clock (RTC) from <u>Analog Devices</u>. This timekeeping device provides an extremely low standby current permitting longer life from a backup supply source. Its clock/calendar feature provides seconds, minutes, hours, day, date, month, and year information. The date at the end of the month is automatically adjusted for months with fewer than 31 days, including corrections for leap year. The clock operates in either 24-hour or 12-hour format with an AM/PM indicator. This Click board<sup>™</sup> is suitable for portable applications, industrial and health-related time metering applications, and others requiring an accurate RTC for their operation.

RTC 12 Click is supported by a <u>mikroSDK</u> compliant library, which includes functions that simplify software development. This <u>Click board</u><sup>m</sup> comes as a fully tested product, ready to be used on a system equipped with the <u>mikroBUS</u><sup>m</sup> 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).



Time-saving embedded tools

MIKROELEKTRONIKA D.O.O, Batajnički drum 23, 11000 Belgrade, Serbia VAT: SR105917343 Registration No. 20490918 Phone: + 381 11 78 57 600 Fax: + 381 11 63 09 644 E-mail: office@mikroe.com www.mikroe.com

## Specifications

| Туре             | RTC   |
|------------------|---|
| Applications     | Can be used for portable applications,<br>industrial and health-related time metering<br>applications, and others requiring an accurate<br>RTC for their operation.   |
| On-board modules | DS1343 - low-current RTC that consumes an<br>extremely low timekeeping current permitting<br>longer life from a backup supply source from<br>Maxim Integrated   |
| Key Features     | Low power consumption, low timekeeping<br>current of 250nA, RTC counts seconds,<br>minutes, hours, days, dates, months, and<br>years with year compensation valid through<br>2099, power-fail and switch circuitry, 96B<br>battery-backed NV RAM, and more. |
| Interface        | SPI   |
| ClickID          | No  |
| Compatibility    | mikroBUS  |
| Click board size | M (42.9 x 25.4 mm)  |
| Input Voltage    | 3.3V or 5V  |

## Resources

<u>mikroBUS</u>™

<u>mikroSDK</u>

Click board<sup>™</sup> Catalog

Click boards™

## Downloads

RTC 12 click 2D and 3D files

DS1343 datasheet

RTC 12 click schematic

RTC 12 click example on Libstock

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).