

INSTRUCTION MANUAL

The Radio Controlled Clock

With the Radio-Controlled Clock, you can have the most accurate time within the continent. It can receive the time signal transmitted by Physikalisch-Technische Bundesanstalt (PTB) of Germany, which is regulated by 4 atomic clocks. PTB transmits the time signal (DCF77, 77.5kHz) continuously from Mainflingen, 25 km southeast of Frankfurt am Main. It is expected that the signal can cover a distance of approx. 1,500km from the transmitter. However, some environmental effects affect the transmitting distance.

For more information, please visit: http://www.ptb.de



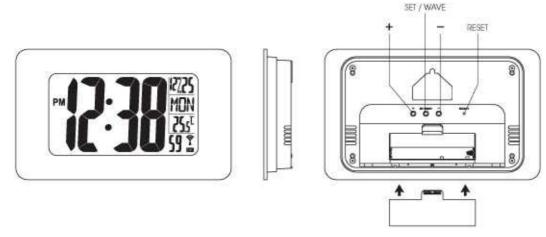
Environmental Reception Effects

The Radio-Controlled Clock obtains the accurate time with wireless technology. Same as all wireless devices, the receiving ability may be affected by, but not limited to, the following conditions (see also the "Local Precautions")

- Long transmitting distance.
- Nearby mountains and valleys.
- Among tall buildings.
- Near railway, high voltage cable, etc.
- Near freeway, airport, etc.
- Near construction site.
- · Bad weather.
- Nearby metallic structures.

Specifications

- Receive 77.5kHz DCF77 signal transmitted by PTB.
- Automatic time adjustment after signal reception.
- Calendar with day-of-the-week display.
- Hour, Minute and Second display.
- 12 or 24 hour format.
- Quartz crystal oscillator frequency: 32.768kHz.
- Time accuracy (atomic clock): better than 1 second in 3000 years.
- Time accuracy (free run): average within 60 seconds per month.
- Operating temperature from 0°C to 50°C (32°F to 122°F).
- Temperature measuring range from -9.9°C to 50°C (14.2°F to 122°F).
- Temperature resolution 0.1°C (0.1°F).



Location Precautions

This clock receives a radio wave much like a TV or radio. Be sure to locate it near a window or some other locations where reception is good. Avoid the following locations, which can interfere with proper reception.



Inside or near concrete/ steel buildings or structures, unless the clock is close / next to a window (with curtain open).



Next or close to power station.



Inside moving vehicles (automobile, train, airplanes etc) which radio transmission or electronics will interfere the reception of radio-controlled clock.



Too close to household appliances (Computer, TV, video/audios, fax machines, speakers).



Near construction sites, traffic lights, roadside, neon lights etc.



Close to or on top of metal surfaces / plates.

Battery Installation

- 1. Lift the tab on the battery door located at the back of the clock.
- 2. Put in batteries with proper polarity (+) and (-).
- 3. Close the battery door.

Warning: Do not mix old and new batteries.

Do not mix alkaline, standard (carbon-zinc) or rechargeable (nickel cadmium) batteries. Batteries shall not be exposed to excessive heat such as sunshine, fire or the like.

Do not touch any other button or setting on your unit. It will automatically receive the time signal after batteries inserted.

Getting Started

As long as batteries are supplying power to the unit, it receives the time signal and adjusts the time automatically. No manual adjustment is required after power up. Accurate adjustment of the clock based on the time signal is supported within Europe.

If no reception after the power-up, we recommend to leave the clock overnight for searching the time signal since night time allows better transmission of time signal.

Signal Receive Operation

The unit automatically receives the time signal everyday at midnight and thereby adjusts itself to the exact time.

The WAVE OK indicator and the antenna tower icon appear on the display if the time signal is successfully received or after manual pressed **SET/WAVE** button.

Important: Do not perform any button or switch operation while a signal receive operation is in progress.

Triggering a Receive Operation Manually

You can trigger a signal receive operation at any time by pressing the **SET/WAVE** button, which cause the unit to perform an immediate signal receive operation.

Unsuccessful Signal Reception

If the automatic update is unsuccessful, the wave on top of the antenna tower and the WAVE OK icon will be disappeared, and the unit will re-try to receive the signal again every hour thereafter for maximum of 4 hours.

If unsuccessful signal reception after battery installation or after reset, the unit keeps trying for 10 minutes every 3 hours until time signal reception successful.

MANUAL CLOCK SETTING

To Set the Time Zone and Language

- 1. Press and hold the **SET/WAVE** button for couple of seconds. You then enter the TIME ZONE and language set mode.
- 2. Press key until your desired language shows on display.
- 3. Press + key to change the time zone until your desired time zone is shown on display.

To Set the Calendar

- 1. Press **SET/WAVE** button after TIME ZONE and language set mode.
- 2. Press + or button sequentially to set the year.
- 3. Holding down either + or button change the year at high speed.
- 4. Press **SET/WAVE** button to confirm the year and go to date set.
- 5. Press + or button sequentially to set the date.
- 6. Holding down either + or button change the date at high speed.

To Set the Time

- 1. Press **SET/WAVE** button after calendar set mode.
- 2. Press + or button sequentially to set minutes, when you press the + or button once, the seconds count resets to 00.
- 3. Holding down either + or button change the time at high speed.

To Set the Format

- 1. Press **SET/WAVE** button after desired time set and go to format set mode.
- 2. Press + button to toggle between 12hr and 24 hr time display format.
- 3. Press button to toggle between °C and °F temperature display format.
- 4. Press **SET/WAVE** button to confirm and quit the set mode.

Room Thermometer

The temperature is displayed on the temperature field, Hi and Lo will be shown if the temperature is out of the measurement range.

Reset the Unit

If the unit does not work properly, reset it by pressing the RESET button.

Care of the device

- Do not expose the device to extreme temperatures or direct sunlight over longer periods.
- Avoid blows and shocks of any kind to the device.
- For cleaning use a dry soft cloth that you have moistened with water and a very mild cleaning agent. Never use volatile substances such as benzene, thinner, cleansing agents in spray cans etc.
- When the device is not being used store it in a dry area and out of the reach of small children. In such cases it is important to remove the batteries!
- If the device is activated under extreme coldness it may occur that the display becomes illegible. As soon as it is returned to a warm environment the device will function normally again.
- Please keep the Instruction Manual and other documents delivered with the device stored carefully so that you can reference them at a later point if necessary.

Disposal of Your Old Product

Your product is designed and manufactured with high quality materials and components, which can be recycled and reused.

When this crossed-out wheeled bin symbol is attached to a product it means the product is covered by the European Directive 2002/96/EC. Also all disposal fees in Switzerland (vRG) are paid.

Please inform yourself about the local separate collection system for electrical and electronic products.



Please act according to your local rules and do not dispose of your old products with your normal household waste. The correct disposal of your old product will help prevent potential negative consequences for the environment and human health.

Support

This device is a new development of Irox Development Technology. All information was made and checked by means of a functioning device. It may occur that adjustments and improvements of the device will take place that due to typographical procedures were not able to be listed in this manual. Should you notice deviations which make it difficult for you to operate and use of the device you may at any time download the latest manual onto your PC free of charge at www.irox.com.

Functions and technical data

Time

- Absolutely accurate time by receiving the time signal DCF77 from Frankfurt.Accuracy is 1 sec in 3000 years.
- Time format adjustable (12 or 24 hour format)
- Time settings manually or as deviation from DCF77 time
- Accuracy of the quartz: approx. 60 secs per month

Weather/Climate

Room temperature and relative humidity.
 Measurement range: -9.9°C to +50°C (14.2°F to 122.0°F), Resolution: 0.1°C

Various

Power Supply
2 x AA (1.5V)
Dimensions
271 x 164 x 37 mm plus table stand

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