UT300R Infrared Thermometer User Manual

PREFACE
Thank you for purchasing the new infrared thermometer. In order to use this product safely and correctly, please read this manual thoroughly, especially the Safety Instructions part. After reading this manual, it is recommended to keep the manual at an easily accessible place, preferably close to the device, for future reference.

LIMITED WARRANTY AND LIABILITY
Uni-Trend guarantees that the product is free from any defect in material and workmanship within one year from the purchase date. This warranty does not apply to damages caused by accident, negligence, misuse, modification, contamination or improper handling. The dealer shall not be entitled to give any other warranty on behalf of Uni-Trend. If you need warranty service within the warranty period, please contact your seller directly.
Uni-Trend will not be responsible for any special, indirect, incidental or consequential damage or loss caused by using this device.

OVERVIEW
UT300R Non-contact Infrared Thermometer (hereinafter referred to as "thermometer"). This product measures temperature by collecting the infrared thermal radiation energy emitted by target surface.

UT300R has advantages of simple and sanitary operation, quick and accurate measurement. It can measure temperature precisely within ±1% by aiming the detector at target object. It is not allowed to be used in the presence of a mixture of flammable anesthetic gas, ars, oxygen or nitrous oxide. UT300R is a continuous operating device.

This product is composed of infrared sensor, circuit components, operating buttons and plastic shell.

SAFETY INSTRUCTION
**Warning:** To use the product properly, please read the following instructions carefully before use:
- To ensure safety and accuracy of measurement, only qualified maintenance personnel can repair it with original components.
- Replace the battery immediately once the battery indicator appears.
- Prior to using the thermometer, please check the box. If any damage to the thermometer were found, please do not use it. Inspect for damage or any shortage of parts.
- Do not place the thermometer near objects with high temperature for long period.
- It is recommended to operate the thermometer within the environment of 15°C-30°C and RH<85%.
- Please use the thermometer indoors and do not expose it to strong sunlight or intense electromagnetic interference.
- Please ensure the temperature around the measuring object is stable, do not test during strong airflow.
- Avoid placing in unstable temperature environment: wait 30min to allow the thermometer to stabilize.
- Wait 10-30min to measure if the measuring object came from very high or very low temperature.
- Please wait 10min to measure new objects after measuring very high or very low temperature.
- It is recommended to measure twice for every object and the highest occurring data should be used.
- Please accurately aim the sensor window at the measuring target. Otherwise error of Hi/Lo indicator will appear.
- Please keep the battery out of the reach of children, children may accidentally ingest. Contact with doctor immediately if that happens.
- If the thermometer will not in use for long period, please take out the battery to avoid leakage. The battery is not allowed to be placed in fire.
- Not for medical use

**SYMBOLES**
- Warning or Caution
- Direct current
- Read the manual before use
- Back body mode
- Dispose the device and accessories properly according to local waste management policy.

**SPECIFICATION**

<table>
<thead>
<tr>
<th>Function</th>
<th>UT300R</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature range</td>
<td>32°C<del>42°C (89°F</del>109°F)</td>
</tr>
<tr>
<td>Accuracy</td>
<td>±0.3°C (0.6°F)</td>
</tr>
<tr>
<td>Repeatability</td>
<td>±0.3°C (0.6°F)</td>
</tr>
<tr>
<td>Resolution</td>
<td>0.1</td>
</tr>
<tr>
<td>Response time</td>
<td>500ms</td>
</tr>
<tr>
<td>Optimum measuring distance</td>
<td>5-10cm</td>
</tr>
<tr>
<td>Measurement alarm</td>
<td>Sound alarm for &gt;37.2°C</td>
</tr>
<tr>
<td>Auto shutdown</td>
<td>*</td>
</tr>
<tr>
<td>°C/F option</td>
<td>*</td>
</tr>
<tr>
<td>Backlight</td>
<td>White</td>
</tr>
<tr>
<td>Operating environment</td>
<td>15°C-30°C (59°F~86°F), RH&lt;85%</td>
</tr>
<tr>
<td>Transport and storage environment</td>
<td>-20°C-60°C (-4°F~140°F), RH&lt;85%</td>
</tr>
<tr>
<td>Battery type</td>
<td>9V (6F22)</td>
</tr>
</tbody>
</table>

**FEATURES**
- White backlight
- Option of Celsius/Fahrenheit
- Dynamic monitoring of battery capacity
- Low voltage indication
- Display screen
- Sound alarm for the upper and lower temperature limit

**LCD FUNCTION DESCRIPTION**
- Battery capacity indication
- Backlight indication
- Celsius/Fahrenheit
- Sound alarm for the upper and lower temperature limit

**WORKING PRINCIPLE**
Infrared thermometer can measure surface temperature of opaque objects. Its optical device can sense the infrared energy concentrated on the detector, and the electronic components convert information into temperature reading which is displayed on the display screen.

**OPERATING METHODS**
To measure temperature, allow the thermometer aim at the measured target, push the trigger to display the real time measured result; release the trigger to hold it. Thermometer will automatically shut down if no action were detected out within fit.

**SETTING OPERATION**
SET:
Cyclical switching setting status: Click on SET to enter the cyclical switching setting status, which is designed with a circular order as follows: °C/F setting → temperature limit value mute setting.

°C/F setting:
It is used to display °C or °F. The unit °C or °F will be displayed during setting. Click "A" or "F" to select °C or °F in cycle.

Temperature limit value mute setting:
When setting, it is able to select mute on/off in cyclic by clicking on "A" or "F". When the mute setting is on, it will be displayed as "A", and the buzzer will be mute, while mute setting is off, "A" will disappear and buzzer will make sounds intermittently.

**BATTERY REPLACEMENT**
Open battery cover to take out the battery. Load a new 9V 6F22 battery and make sure the battery is placed correctly.

**MAINTENANCE**
The thermometer is a repeatedly-used accurate device, so please pay attention to clean and maintenance. Especially keep the lens clean, or the accuracy may be affected.

Clean:
1. Clean chassis: Clean the chassis with cotton sponge or soft cloth with medicinal alcohol or clean water.
2. Clean lens: Blow away the slipped off grains with clean compressed air. Wipe the surface carefully with wet cotton abag. Cotton swab should be moistened with medicinal alcohol or clean water.

**FAULT DIAGNOSIS**

<table>
<thead>
<tr>
<th>Symptom</th>
<th>Problem</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hi (on the screen)</td>
<td>Target temperature exceeding range</td>
<td>Select the target within range</td>
</tr>
<tr>
<td>LO (on the screen)</td>
<td>Target temperature lower than range</td>
<td>Select the target within range</td>
</tr>
<tr>
<td>Battery icon flashes</td>
<td>Battery low</td>
<td>Replace battery</td>
</tr>
<tr>
<td>Possible blank screen</td>
<td>Battery drained</td>
<td>Check and/or replace battery</td>
</tr>
</tbody>
</table>

**ACCESSORIES**
- Battery: 1
- Manual: 1
- Device: 1