

Operation Testing Device  
for Infrared Spot Type Flame Detector

**MTE2-NK**

◆◆◆ Instruction Manual ◆◆◆

For the best performance and safety,  
please read this manual carefully.



1. Safety Instructions

For optimum performance and safety, please follow the safety instructions below.

**CAUTION**

- Do not use this device near high-voltage power lines.
- If working at height, make sure to use a stable scaffold and wear a safety belt without fail.

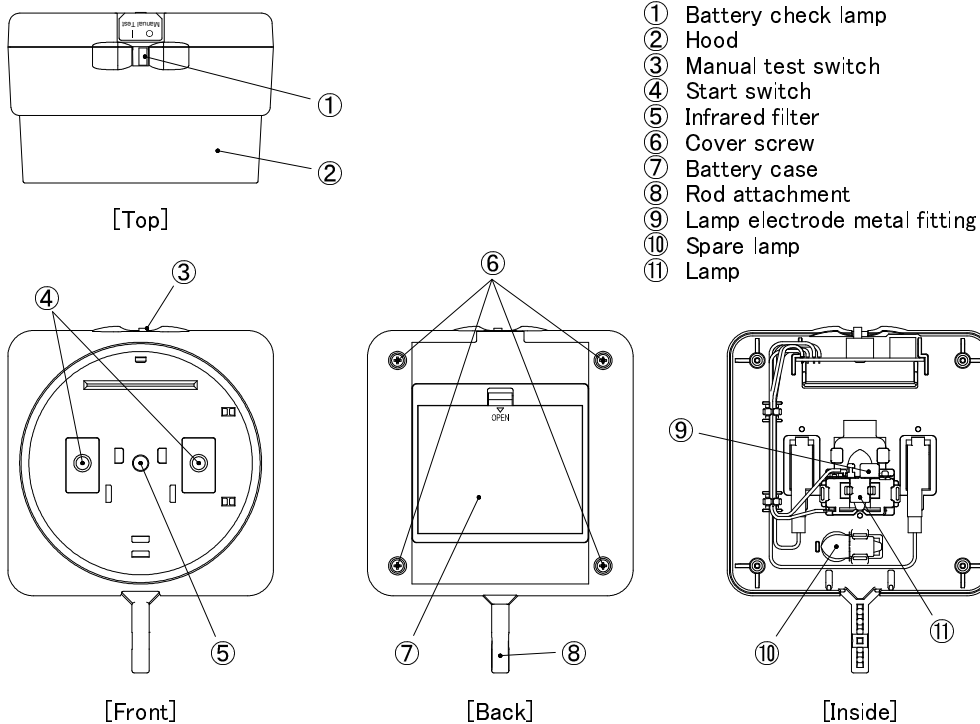
**WARNING**

- Do not apply shock to the device. Pay extra attention when using an extension rod (optional product).

2. Overview

This device is a test tool for IR flame detector. It is possible to perform an operation test for an IR flame detector safely without using fire, by a quasi-flame created through the use of lamp and infrared filter.

3. Part Names



4. Special notes

- This device cannot be used for an operation test of any ultra violet flame detector, or any combined UV and IR flame detector.
- Please use alkaline batteries. If you use manganese batteries, operating time will be shortened. You cannot use nickel-metal hydride batteries.
- When the battery check lamp darkens during an operation test, it is time to replace the batteries.
- When replace the batteries, do not mix old and new, or different kinds or different manufactures of batteries.
- Do not recharge dry cell LR6 batteries.
- When used at the temperature of below 5°C, lifetime of alkaline batteries might be significantly shortened.
- It is recommended to prepare extra batteries when in use.
- When not in use for a long time, remove batteries from the device. (refer to 5-2)
- Do not touch the surface of infrared filter by hand. When the infrared filter gets dirty, wipe off dust and dirt gently with a clean cotton swab so that the glass is not scratched.
- If the infrared filter is stained badly, please wipe off stains with a neutral detergent or alcohol. Do not use organic solvents, as they may cause malfunction.
- An extension rod is an optional product.

5. Operation procedure

5-1 Operation test

Please perform an operation test by the following procedure.

- Turn ON the manual test switch on the top of device, and check if the battery check lamp is bright. If the battery check lamp is not fully bright, it is time to replace the batteries (\*Note 1). Please refer to 5-2 and replace the batteries.
- Attach an extension rod to the rod attachment part. Fix the device firmly with bolts, adjusting the angle for a detector.
- Choose one of 2 methods below, according to the environment in which a detector is installed.
  - When a detector is easily accessible-use the start switch. Attach the hood of device on a detector. As the start switch is pushed by the detector, the operation test starts with a buzzer sound "beep beep beep". After the buzzer sounds for 10 to 30 seconds, confirm if the operation indication lamp of detector lights up.

- When a detector is not accessible because of height or location-use the manual test switch on the top of device. Turn ON the manual test switch. With a buzzer sound "beep beep beep", the device is ready for the operation test. Bring the device close to a detector. Make sure that the distance between the infrared filter of device and the detector is less than 1 cm. Confirm if the operation indication lamp of detector lights up within 30 seconds.

\*1) The operation test can be conducted even after the time for battery replacement passes, however, it is strongly recommended to replace the batteries to perform the test properly. (Refer to 5-2).

5-2 Battery replacement

- Remove the lid of the battery case on the back of device.
- Replace with new batteries, ensuring the correct polarities are observed.
- Turn ON the manual test switch, and confirm if the battery check lamp lights up.
- Attach the lid of the battery case to the device.

5-3 Lamp replacement

- Turn OFF the manual test switch.
- Remove the screws (4pcs) on the back of device to remove the cover.
- Slide the lamp electrode metal fitting and remove the lamp.
- Replace with the spare lamp (Panasonic MB-48P5K/2B\*Note 2) inside the case. Fix it with the lamp electrode metal fitting.
- Turn ON the manual test switch and confirm that the lamp blinks.
- Return the cover to its original position, by fixing it with screws.

\*2) It is recommended to prepare a spare light bulb at all times. Please contact us about compatible light bulbs by other manufacturers.

6. Troubleshooting

If the device does not work properly, take the following countermeasures.

When Start switch is turned on

Phenomenon Battery check lamp does not light up. The buzzer does not sound.

Cause: Battery is not installed. Battery is incorrectly positioned. Battery voltage reduces. Battery deteriorates.

Counter-measure: Install or replace the battery. (Refer to 5-2)

When Manual test switch is turned on

Phenomenon Test lamp does not light up. Battery check lamp is on.

Cause: Test lamp is burned out. Test lamp or lamp electrode metal fitting is not positioned properly.

Counter-measure: Install or replace the test lamp. (Refer to 5-3)

During the operation test with Start switch

Phenomenon A detector does not work or responds late.

Cause: Infrared filter gets dirty.

Counter-measure: Wipe off dust and dirt gently with a clean cotton swab.

During the operation test with Manual test switch

Phenomenon A detector does not work or responds late.

Cause: The distance between the device and detector is too large. The device is not positioned at right angles.

Counter-measure: Adjust the angle of the device, and perform the test within 1cm from a detector.

7. Specifications

Product name	Operation Testing Device for Infrared Spot Type Flame Detector
Model name	MTE2-NK
Gap	Use within 1cm from a detector
Ambient temp.	Operating temp: 0 - 50°C (within 90%RH, non-condensing) Storage temp: -20 - 70°C (within 90%RH, non-condensing)
Batteries	LR6(AA) × 4 (Local procurement)
Lamp	Piliken bulb 4.8V 0.5A (Panasonic MB-48P5K/2B)/ (OHM ELECTRIC SL-L4850K/2P)
Size	124(W) × 162(H) × 80(D)
Weight	approx. 360g
Accessories	Instruction Manual, Cotton swab(4pcs), Spare lamp (1pc/inside the case)

8. Disposal

Please follow local codes or regulations, if you need dispose the MTE2-NK or used batteries.

9. Contact information

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10. Conformity

