

Nonylphenol polyethoxylates (NPE) is a kind of nonionic surfactants. Concerns about the environmental impact of these compounds has increased since the 1990s. Previously, the use of NPE was forbidden within the EU, but there was no limit on the level of NPE residue on imported articles.

This product utilizes the high affinity of monoclonal antibody against NPE, which can easily identify its contamination in milk without any instrument.

1. Detection Limit (LOD)

Milk: 150ppb

Milk powder (after 1:9 reconstitution with water): 200-220ppb.

2. Kit components

- Test Strip, 96 pcs in 12 plastic bottles, 8 pcs / bottle.
- Kit insert

3. Sample preparation

Raw Milk: Take 3 ml of sample into a centrifuge tube, then add 200 ul of **anhydrous ethanol**, vortex for 1 min, the mixture used as the test sample.

Milk powder: Dissolve the milk powder with pure water in the ratio of 1: 9 (1g milk powder + 9ml pure water), then take 3 ml of sample into a centrifuge tube, then add 200 ul of **anhydrous ethanol**, vortex for 1 min, the mixture used as the test sample.

4. Operations

- a) Read the instructions before experiment. Bring the test kit and samples to room temperature. Milk samples should be fully liquid without any agglomeration and deposition.
- b) Take bottles needed from the kit package, take out required wells and strips, and make proper marks. Please use the test strips within 1h. Seal the cap of the bottles and store the unneeded kit.
- c) Take 200ul of the test sample into the microwell, then repeatedly absorb up and down for 5 times to mix the sample with the reagent in the wells completely. The mixture should be pink, and then start the timer.

Note: in case you are sampling with plastic pipet, please add sample close to the **MARKER LINE** on the wells.

- d) Incubate for **3min at 40 °C or room temperature**, and then insert the test strip into the well with the "Immersed" end fully dipped in to the mixed reagent and sample.

- e) Incubate for **5min at 40 °C or room temperature** again. Take out the strip; determine the result according to Part 4.

5. Result Determination

Positive (+) Line C is red, line T has no color, OR color of Line T is lighter than Line C;

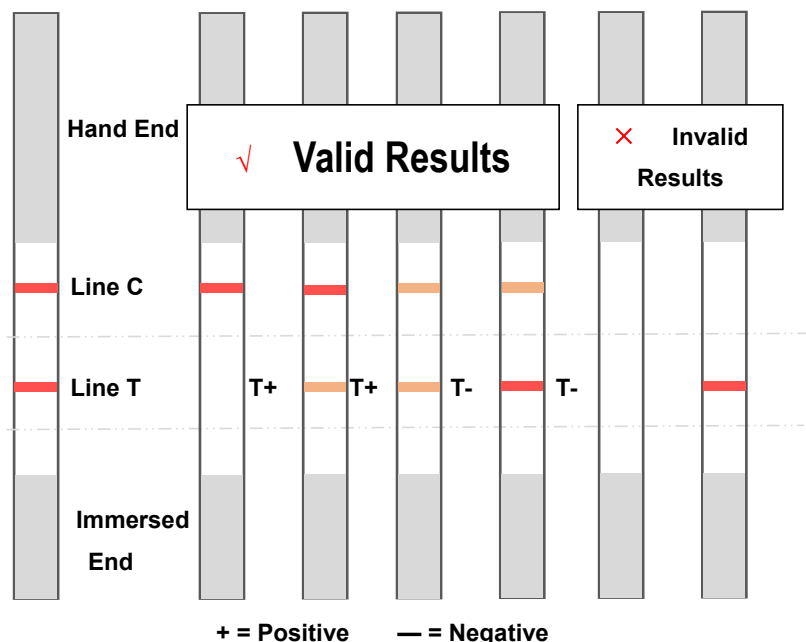
Negative (-) Line T and Line C are both red, and color of Line T is deeper than or equal to Line C.

Invalid (x) Line C has no color. In this case, please reread the instructions and repeat assay with new strip.

Notice: If the result of the strip needs to be recorded, please cut the "Immersed" end, and dry the strip, then keep it as file or paste in your recording book.

6. Storage

2-8°C in cool dark place, do not freeze. The kit is valid for 12 months. Lot No. and expired date are printed on the package.

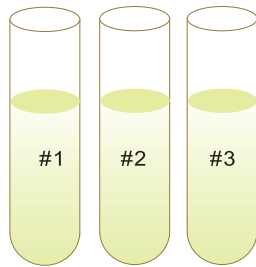


7. Notice and Precautions for a successful experiment.

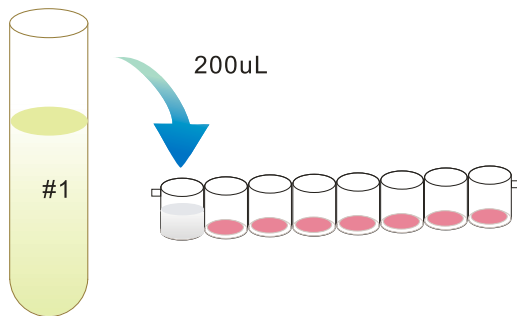
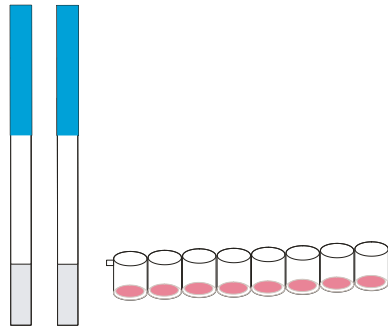
- Perform the assay following the instruction; do not touch the membrane of the strip.
- Seal the bottle after taking out required strips.
- This strip is used **for only once**; please do not use it repeatedly.
- This kit is only for screening test, positive result should be further confirmed with other method.

Schematic Assay Steps

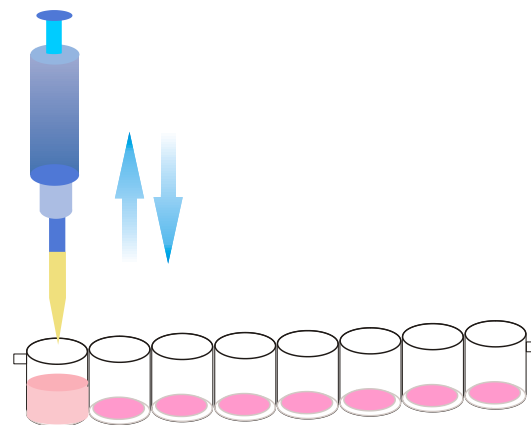
1. Bring all test samples to room temperature; number them to keep record.



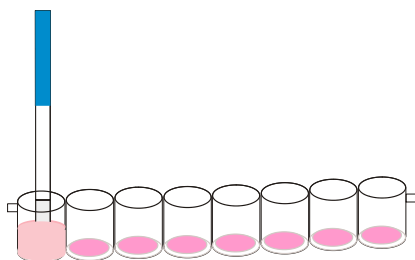
2. Take test kit according to your sample number and also number the kit wells to keep record and consistency.



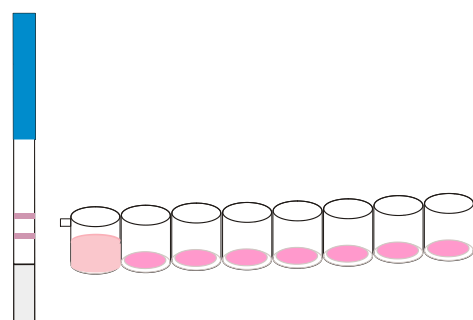
3. Take 200ul sample into the wells using pipet. You can also then put the well into the well holder to avoid sample spill.



4. Absorb up and down for 5 times to mix sample with reagent completely. Start the timer when the mixture is pink. **Incubate for 3 min at 40 °C or room temperature.**



5. Insert the "Immersed" end of the strip into the mixture; **Incubate for 5 min at 40 °C or room temperature again.**



6. Take out the strip; judge the result according to **kit instruction**.

Ring Biotechnology Co., Ltd

Add: Building 3, Zhongtongtai TechnoPark, No. 11, Kechuang 14th St, Beijing 100176, CHINA

E-mail: info@ringbio.com Web: www.ringbio.com Tel: +86-10-56267496