



Instructions for Catalog # 079 Heterotrophic Plate Count

Revision 121619

Description:

- This standard consists of one glass vial containing one gelatin tablet and a desiccant pouch. The bacteria are contained in the gelatin tablet. One sterile, 100 mL hydrating fluid is also provided.
- The glass vial containing the bacteria should be stored at 4±2°C.
- The hydrating fluid can be stored at room temperature.
- Various aspects of this proficiency testing scheme may be subcontracted. When subcontracting occurs, it is performed by a competent subcontractor and ERA is responsible for subcontracted work.
- The hydrated sample contains Heterotrophic bacteria at 5 to 500 CFU/mL and/or 5 to 500 MPN/mL.

Before you begin:

- The bacteria are in a lyophilized form in the gelatin tablet and each standard must be hydrated per the following instructions prior to analysis.
- ERA recommends that the quality control guidelines in *Standard Methods for the Examination of Water and Wastewater*, Section 9020B be followed to determine media acceptability prior to analysis.
- “EPA strongly recommends that laboratories evaluate the false-positive and negative rates for method(s) they use for monitoring total coliforms . . . with the intent that if the method they choose has an unacceptable false-positive or negative rate, another method can be used.” – 40 CFR 141.21 f.3.12
- This standard contains viable microorganisms and should be analyzed **immediately** after being hydrated.
- If analyzing this sample using a pour-plate, spread-plate, or membrane-filter method, evaluation limits will be as whole numbers.
- If analyzing this sample using a most probable number (MPN) method, evaluation limits will be to three significant figures.
- Membrane filtration results reported as “too numerous to count” will be evaluated as “No Evaluation.”
- MPN results reported as “> value” will be scored as not acceptable.

Instructions:

1. Remove the vial from refrigeration and allow to warm to room temperature.
2. Carefully open the hydrating fluid that has been stored at room temperature.
3. Open the bacteria sample vial and aseptically transfer the gelatin tablet into the hydrating fluid.
4. Properly dispose of the empty glass vial and desiccant pouch.
5. Reseal the bottle that now contains the bacteria sample.
6. With the bottle tightly closed, shake the sample for a few seconds. Observe the sample to confirm that the gelatin tablet has dissolved. If the tablet has not completely dissolved, shake for a few more seconds.
7. Analyze the inoculated sample using your normal procedures.
8. Report your results as CFU/mL or MPN/mL for the sample prepared as above.

Safety:

- ERA products may be hazardous and are intended for use by professional laboratory personnel trained in the competent handling of such materials. Responsibility for the safe use of these products rests entirely with the buyer and/or user. Safety Data Sheets (SDS) for all ERA products are available through our website www.eraqc.com.
- **ERA microbiology standards contain live microorganisms** and should be used only by individuals with bacteriological training.
- Properly disinfect any spills and sterilize used containers by autoclaving before disposal.