Nutrient Agar No. 2

Intended Use
Nutrient Agar No. 2 is a general-purpose culture medium used for the cultivation of bacteria.

Summary
Nutrient Media are general propose media used for the examination of water and dairy products according to Standard Methods for the Examination of Water and Waste water and Dairy Products. Nutrient Agar No. 2 can be used for the microbiological analysis of water as per Czech Standards. It can also be used for sterility testing of aerobes and also for maintenance of subcultures.

Principle
Beef extract and peptic digest of animal tissue provide the necessary nitrogen compounds, carbon, vitamins and also some trace ingredients to the bacteria. Sodium chloride maintains osmotic equilibrium of the medium.

Formula*

Ingredients	**g/L**
Peptic Digest of Animal Tissue	10.0
Beef Extract	10.0
Sodium Chloride	5.0
Agar	15.0
Final pH (at 25°C)	7.2 ± 0.2

*Adjusted to suit performance parameters.

Storage and Stability
Store dehydrated medium below 30°C in tightly closed container and the prepared medium at 2°C-8°C. Avoid freezing and overheating. Use before expiry date on the label. Once opened keep powdered medium closed to avoid hydration.

Type of specimen
Water and Waste Water samples; Food and Dairy samples

Specimen Collection and Handling
Ensure that all samples are properly labelled. Follow appropriate techniques for handling samples as per established guidelines. Some samples may require special handling, such as immediate refrigeration or protection from light, follow the standard procedure. The samples must be stored and tested within the permissible time duration. After use, contaminated materials must be sterilized by autoclaving before discarding.

Directions
1. Suspend 40.00 g of the powder in 1000 mL purified / distilled water.
2. Heat to boiling to dissolve the powder completely.
3. Sterilize by autoclaving at 121°C (15 psi) for 15 minutes as per validated cycle.
4. Mix well and pour into sterile petridishes.

Quality Control
Dehydrated Appearance: Cream to yellow coloured, homogenous, free flowing powder.
Prepared Appearance: Light yellow to amber coloured, clear to slightly opalescent gel forms in petridishes.
Growth Promotion Test: Growth promotion is carried out in accordance with the harmonized method of USP/EP/JP/IP and growth is observed after an incubation at 30°C-35°C for 18 to 24 hours.
Growth Promoting Properties: The test results observed are within the specified temperature and shortest period of time specified in the test, inoculating ≤ 100 cfu of appropriate microorganism at 30°C-35°C for 18 hours.

Organism (ATCC)	Growth
Escherichia coli (25922)	Good
Klebsiella aerogenes (13048)	Good
Klebsiella pneumoniae subsp. *pneumoniae* (10031)	Good
Salmonella enterica subsp. *enterica* serovar *Typhimurium* (14028)	Good

Note: For good growth - Growth obtained on test media should not differ by a factor greater than 2 from calculated value for a standardized inoculum.

Performance and Evaluation

Performance of the product is dependent on following parameters as per product label claim:

1. Directions
2. Storage
3. Expiry

Warranty

This product is designed to perform as described on the label and package insert. The manufacturer disclaims any implied warranty of use and sale for any other purpose.

Reference

1. Clesceri L. S, Greenberg A. E. and Eaton A. D., (Eds.), 1998, Standard Methods for the Examination of Water and Wastewater, 20th Ed., APHA, Washington, D.C.
2. American Public Health Association, 1978, Standard Methods for the Examination of Dairy Products, 14th Ed., APHA, Inc., Washington, D.C.
3. MacFaddin J. F., 1985, Media for Isolation-Cultivation- Identification-Maintenance of Medical Bacteria, Vol. I, Williams and Wilkins, Baltimore.
4. Data on file: Microxpress®, A Division of Tulip Diagnostics (P) Ltd.

Product Presentation:

Cat No.	Product description	Pack Size
201140050500	Dehydrated Culture Media	500 g