

TM 1477 – TARTOFF - HOBBS BROTH (TERRIFIC BROTH)

INTENDED USE

A buffered enriched medium for propagation of recombinant E. Coli.

PRODUCT SUMMARY AND EXPLANATION

Tartoff Hobbs developed the Terrific Broth Medium for cultivation of recombinant *Escherichia coli* strains. These strains have extended growth phase when cultivated in this medium. Tartoff-Hobbs Medium supports high cellular density and mass and maintains the growth in the logarithmic phase for a long time. Due to this fact, it provides greater yields of recombinant proteins and plasmid DNA. Often, Tartoff-Hobbs (Terrific) Broth substitutes Luria Bertani Broth, to get enhanced yields of plasmid DNA and recombinant proteins. The procedures for inoculation, incubation and generation of recombinant strains are detailed by Sambrook et al.

COMPOSITION

Ingredients	Gms / Ltr		
Casein enzymic hydrolysate	12.000		
Yeast extract	24.000		
Monopotassium phosphate	2.2000		
Dipotassium phosphate	9.400		

PRINCIPLE

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INSTRUCTION FOR USE

- Suspend 47.6 grams in 1000 ml distilled water containing 4 ml glycerol.
- Heat if necessary to dissolve the medium completely.
- Sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes.
- Mix well and dispense as desired.

QUALITY CONTROL SPECIFICATIONS

Appearance of Powder: Cream to light yellow homogeneous free flowing powder.Appearance of prepared medium: Light amber coloured clear solution without any precipitate.

pH (at 25°C) : 7.2±0.2

INTERPRETATION

Cultural characteristics observed after incubation.

Microorganism ATCC Inoculum (CFU/ml)	Growth	Incubation Temperature	Incubation Period
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Escherichia coli	23724	50-100	Good	35-37°C	18-24 Hours
Escherichia coli	39403	50-100	Good	35-37°C	18-24 Hours
Escherichia coli	47014	50-100	Good	35-37°C	18-24 Hours
Escherichia coli	53868	50-100	Good	35-37°C	18-24 Hours

PACKAGING:

In pack size of 500 gm bottles.

STORAGE

Dehydrated powder, hygroscopic in nature, store in a dry place, in tightly-sealed containers between 25-30°C and protect from direct sunlight. Under optimal conditions, the medium has a shelf life of 4 years. When the container is opened for the first time, note the time and date on the label space provided on the container. After the desired amount of medium has been taken out replace the cap tightly to protect from hydration.

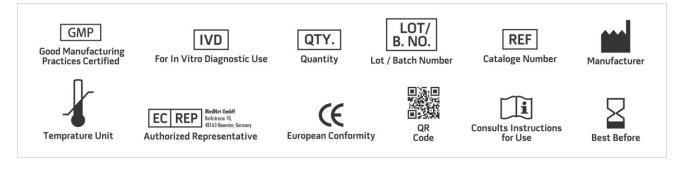
Product Deterioration: Do not use if they show evidence of microbial contamination, discoloration, drying or any other signs of deterioration.

DISPOSAL

After use, prepared plates, specimen/sample containers and other contaminated materials must be sterilized before discarding.

REFERENCES

- 1. Tartoff K. D. and Hobbs C. A., 1987, Improved Media for Growing Plasmid and Cosmid Clones, Bethesda Res. Lab. Focus, 9:12.
- 2. Sambrook J., Fritsch, E. E., and Maniatis T., 1989, Molecular Cloning: A Laboratory Manual, 2nd Ed., Cold Spring Harbor Lab., Cold Spring Harbor, N.Y.



NOTE: Please consult the Material Safety Data Sheet for information regarding hazards and safe handling Practices.

*For Lab Use Only
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