

TM 1964 – ANTIBIOTIC ASSAY MEDIUM B (as per BP)

INTENDED USE

For the microbiological assay of Colistimethate sodium sulphate using *Bordetella bronchiseptica* and *Escherichia coli*.

PRODUCT SUMMARY AND EXPLANATION

Antibiotic Assay Medium B is used for the microbiological assay of Colistimethate sodium. It is recommended by various pharmacopoeia.

Freshly prepared plates should be used for antibiotic assays. Test organisms are inoculated in sterile seed agar cooled to 40-45°C and spread evenly over the surface of solidified base agar. All conditions in the microbiological assay must be controlled carefully. The use of standard culture media in the test is one of the important step for the good results.

COMPOSITION

Ingredients	Gms / Ltr
Tryptone	17.000
Soya peptone	3.000
Sodium chloride	5.000
Dipotassium hydrogen phosphate	2.500
Dextrose (Glucose)	2.500
Agar	15.000

PRINCIPLE

Combination of tryptone and soya peptone provides essential nutrients for the growth of test organisms. Dextrose provides fermentable source of carbon, and enhances the growth of test organisms. Phosphates in the medium enhances buffering action and sodium chloride maintains osmotic equilibrium.

INSTRUCTION FOR USE

- Dissolve 45.0 grams in 1000 ml purified / distilled water containing 10ml Polysorbate 80.
- Heat to boiling to dissolve the medium completely. Sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes.
- Adjust the pH of the medium, using freshly prepared buffer solution. Cool to 45-50°C.
- Mix well and pour into sterile Petri plates.

QUALITY CONTROL SPECIFICATIONS

Appearance of Powder	: Cream to yellow homogeneous free flowing powder.
Appearance of prepared medium	: Light amber coloured clear to slightly opalescent gel forms in Petri plates.
pH (at 25°C)	: 7.3±0.2

INTERPRETATION

Cultural characteristics observed after incubation.

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Recovery	Antibiotics assayed	Incubation Temperature	Incubation Period



<i>Bordetella bronchiseptica</i>	4617	50-100	Luxuriant	>=70%	Colistimethate sodium	35-37°C	18-24 Hours
<i>Escherichia coli</i>	10536	50-100	Luxuriant	>=70%	Colistimethate sodium	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. British Pharmacopoeia, 2016, British Pharmacopoeia Commission
2. European Pharmacopoeia, 2017, European Pharmacopoeia Commission
3. Isenberg, H.D. Clinical Microbiology Procedures Handbook 2nd Edition.
4. Jorgensen, J.H., Pfaller, M.A., Carroll, K.C., Funke, G., Landry, M.L., Richter, S.S and Warnock., D.W. (2015) Manual of Clinical Microbiology, 11th Edition. Vol. 1.

 GMP Good Manufacturing Practices Certified	 IVD For In Vitro Diagnostic Use	 QTY. Quantity	 LOT/ B. NO. Lot / Batch Number	 REF Catalogue Number	 Manufacturer
 Temperature Unit	 EC REP Authorized Representative <small>MedNet GmbH Birkstrasse 10, 48163 Muenster, Germany</small>	 European Conformity	 QR Code	 Consults Instructions for Use	 Best Before

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

***For Lab Use Only**
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