TMV 306 – BREWER THIOGLYCOLLATE MEDIUM, MODIFIED (LINDEN THIOGLYCOLLATE MEDIUM) (VEG.)

INTENDED USE

For sterility testing of biological products and isolation of aerobic and anaerobic organisms.

PRODUCT SUMMARY AND EXPLANATION

These media are prepared by completely replacing animal based peptones with vegetable peptones. Brewer Thioglycollate Veg medium is the modification of Brewer Thioglycollate Medium prepared as per the original formula of Brewer. Brewer Thioglycollate Veg Medium Modified is a modification of Linden Thioglycollate Medium.

The uninoculated medium shows bluish green colour at the top indicating presence of oxygen in that part. Modified medium contains more thioglycollate and was recommended for sterility testing procedures. Organisms which ferment dextrose and lower the pH to critical levels may not survive in this medium after growth has taken place.

Note: if more than the upper one third layer acquires bluish-green colour (absorbs oxygen), the dissolved oxygen can be removed by heating the medium in free flowing steam for 5-10 minutes or in a water bath untill the green colour disappears, and the prepared medium should be stored in the dark till use.

COMPOSITION

Ingredients	Gms / Ltr
Veg hydrolysate	17.500
Papaic digest of soyabean meal	2.500
Dextrose	10.000
Sodium chloride	5.000
Dipotassium phosphate	2.000
Sodium thioglycollate	1.000
Methylene blue	0.002
Agar	0.500

PRINCIPLE

It contains highly nutritious Veg peptone No.3, Veg infusion and Veg hydrolysate which support luxuriant growth of even fastidious bacteria. Sodium thioglycollate helps to create anaerobic condition as well as neutralizes toxicity of mercurial compounds if present in the inoculum of the test material. Very small amount of agar present maintains anaerobic conditions at the bottom of the broth. Methylene blue is a oxidation-reduction indicator, indicating oxygen content of the medium by exhibiting bluish-green colour to the medium in presence of oxygen.

INSTRUCTION FOR USE

- Dissolve 38.5 grams in 1000 ml purified / distilled water.
- Heat to boiling to dissolve the medium completely.
- Dispense in tubes or in suitable containers as desired and sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes and cool to 45-50°C.

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QUALITY CONTROL SPECIFICATIONS

Appearance of Powder : Light yellow coloured, may have slightly greenish tinge, homogeneous, free flowing powder.

Appearance of prepared medium : Yellow coloured, clear to very slightly opalescent fluid with upper 10% or less medium bluish green on standing.

pH (at 25°C) : 7.2±0.2

INTERPRETATION

Cultural characteristics observed after incubation. (*Clostridium* and *Bacteroides* species incubated anaerobically)

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Recovery	Incubation Temperature	Incubation Period
Bacteroides melaninogenicus	25848	50-100	Luxuriant	>=70%	35-37°C	18-48 Hours
Clostridium sporogenes	11437	50-100	Luxuriant	>=70%	35-37°C	18-48 Hours
Streptococcus mitis	9895	50-100	Luxuriant	>=70%	35-37°C	18-48 Hours
Streptococcus pyogenes	19615	50-100	Luxuriant	>=70%	35-37°C	18-48 Hours

PACKAGING:

In pack size of 100 gm and 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.

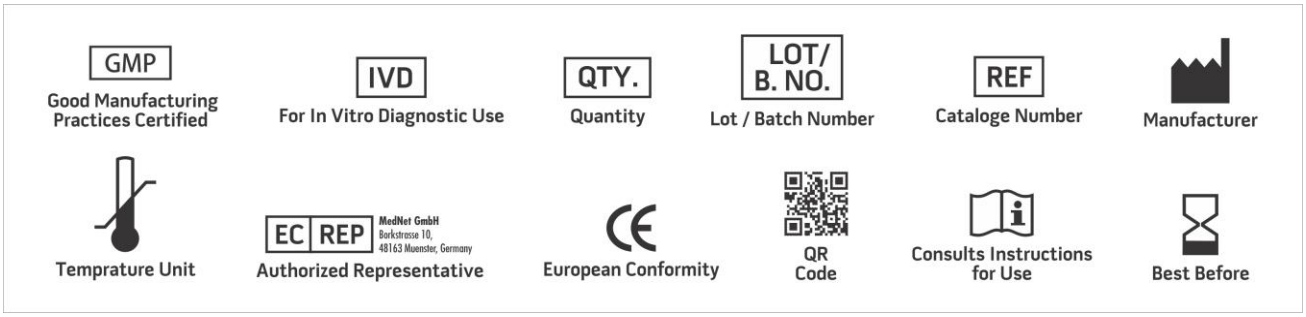
Product Deterioration: Do not use if they show evidence of microbial contamination, discoloration, drying or any other signs of deterioration.

DISPOSAL

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

REFERENCES

1. Brewer, 1940, J. Bact., 39:10
2. Brewer,1940, J.A.M.A., 115:598.
3. Bulletin, National Institute of Health, 1941.



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

***For Lab Use Only**

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