

# Lactose Sulphite Broth



Medium used for the isolation and identification of *Clostridium perfringens* on the basis of gas production and sulfite reduction.

## • CONTENTS (Liter)

Pancreatic Digest of Casein	5.0 g
Yeast Extract	2.5 g
Lactose	10.0 g
Sodium Chloride	2.5 g
L-Cysteine	0.3 g
Sodium Metabisulphite	0.6 g
Ferric Ammonium Citrate	0.5 g
Final pH = 7.1 ± 0.2 at 25°C	

## • PROCEDURE

Suspend 21.4 G of powder in 1 L of distilled or deionized water. Heat to boiling until completely dissolved. Sterilize by autoclave at 121°C for 15 minutes. Cool to 45 - 50°C in water bath. Mix well. Pour into tubes with durham tubes.

## • INTERPRETATION

Lactose Sulphite Broth is a medium used for isolation and identification of *Clostridium perfringens* on the basis of gas production and sulfite reduction. Pancreatic digest of casein and yeast extract provide nitrogen, carbon, vitamins and minerals. Lactose is the fermentable carbohydrate. Sodium chloride maintains the osmotic balance. L-Cysteine is the reducing agent. Sodium metabisulfite and ferric ammonium citrate are indicators of sulfite reduction.

## • TECHNIC

Inoculate the specimen using a sterile needle to the medium. Incubate at 46 ± 0.5°C for 18 - 48 hours under anaerobic condition. Refer appropriate references for recommended test procedure.

## • QUALITY CONTROL FOR USE

### Dehydrated medium

Appearance: free-flowing, homogeneous

Color: light beige

### Prepared medium

Appearance: slightly opalescent

Color: amber

Incubation conditions: 46 ± 0.5°C / 18 - 48 hours under anaerobic condition

Microorganism	ATCC	Growth	Gas Production	Blackening
<i>Clostridium perfringens</i>	13124	good	+	+

**• STORE**

The powder is very hygroscopic. Store the powder at room temperature, in a dry environment, in its original container tightly closed and use it before the expiry date on the label. Store prepared medium at 2 - 8°C.

**• REFERENCES**

1. European Pharmacopoeia 5.6.
2. Beerens, H., Romond, C.H., Lepage, C., and Criquelion, J. 1982. A Liquid Medium for the Enumeration of *Clostridium perfringens* in Food and Faeces. Isolation and Identification Methods for Foods Poisoning Organisms. Edited by Academic Press London, 137-149.

**• PACKAGE**

Cat. No : MB-L2187 Lactose Sulphite Broth	500 G
--	-------