

## Selenite Cystine Broth

Cat. Numbers: TT130  
BP214

**Pkg:** TT - 20 tubes in a box, containing 4.0 ml of prepared medium  
BP - 125P ml in septum capped bottle, 200 and 400 ml in a screw capped bottle

**Exp. Date:** Printed on label and on the item

**Required materials not supplied:** Laboratory equipment as required.

Hy-Laboratories Ltd.  
Park Tamar  
Rehovot 76326 Israel  
Tel : 972-8-9366475  
Fax : 972-8-9366474  
[hylabs@hylabs.co.il](mailto:hylabs@hylabs.co.il)  
[www.hylabs.co.il](http://www.hylabs.co.il)

### Purpose

Selenite Cystine Broth is recommended for the selective enrichment of Salmonella spp. in clinical and non-clinical specimens. Enrichment media are routinely employed for detection of pathogens in fecal specimens since the pathogens usually represent only a small percentage of the intestinal flora. Selenite Cystine Broth is recommended for use in the recovery of Salmonella with subcultures being made after 12-18 hours of incubation.

### Composition

Ingredients Gms / Litre:

Sodium Phosphate	10.0
Tryptone	5.0
Lactose	4.0
Sodium Selenite	4.0

### Appearance

Very light amber, clear to very slightly opalescent, may have a slight precipitate.

**Final pH** ( at 25°C) 7.0 ±0.2

## Procedures

For feces and other solid materials

- Suspend 1-2 g of the specimen in the broth (approximately 10-15% by volume) and emulsify with an inoculating needle, if necessary. Swab specimens may be inserted directly into the broth
- Incubate tubes with loosened caps at  $35 \pm 2^{\circ}\text{C}$  for up to 24 hours.
- Place one to two drops of the incubated broth onto selective plate media, such as MacConkey or XLD Agar and streak for isolated colonies.
- Subcultures should be made after 12-18 hours of incubation, if possible. Coliforms will tend to overgrow the pathogens if incubated longer than 24 hours.

## Cultural Response

Cultural characteristics observed after an incubation at  $35\text{-}37^{\circ}\text{C}$  for 18-24 hours and sub-cultured on MacConkey agar.

Microorganism	Inoculum	Recovery on MacConkey
Salmonella typhimurium ATCC 14028	Up to 10 <sup>2</sup> cfu	Good growth. Colorless
E. coli ATCC 25922	10 <sup>5</sup> cfu	Partially inhibited Pink with bile precipitate

## Storage

2-80 C

## Limitations

The recovery of many Salmonella is greatly jeopardized if stool specimens remain unpreserved for more than three hours before processing. If there is to be a delay in processing, the specimen should be inoculated onto an appropriate transport medium and refrigerated until inoculation.

A brick red precipitate may appear if Selenite Cystine Broth is overheated during preparation or exposed to excessive moisture during storage.

## Waste Disposal

After interpretation all items should be destroyed by standard incineration methods.