



Actero™ Bismuth Sulfite Agar Product Information

Catalogue No.	Description
FCM-090	Actero™ Bismuth Sulfite Agar (500 G)
FCM-089	Actero™ Bismuth Sulfite Agar (2 KG)
FCM-088	Actero™ Bismuth Sulfite Agar (10 KG)

INTENDED USE

Bismuth Sulfite Agar is used for the isolation of *Salmonella* spp. A modification by Wilson and Blair, Bismuth Sulfite Agar uses Bismuth and Sodium Sulfite for the selective isolation and of typhoid and non-typhoid *Salmonella*. This medium is used particularly for the isolation of *Salmonella typhi* from clinical and environmental specimens including food, feces, urine, and sewage. Bismuth and brilliant green dye act as inhibitors to most enteric bacteria and Gram-positive bacteria but allow *Salmonella typhi* to produce black colonies surrounded by a metallic sheen.

Formula* per Liter:

Casein Digest Peptone.....5.0g
Peptic Digest of Animal Tissue .5.0g
Disodium Phosphate.....4.0g
Bismuth Sulfite Indicator8.0g
Agar.....20.0g
Beef Extract.....5.0g
Ferrous Sulfate0.3g
Brilliant Green.....0.025g
Dextrose5.0g

Final pH: 7.5 ± 0.2 at 25°C

* Grams per liter may be adjusted or formula supplemented to obtain desired performance.

PREPARATION

Mix 52 grams of the dehydrated medium in one liter of purified water until evenly dispersed. Heat with repeated stirring and boil for minute to dissolve completely. Mix thoroughly to obtain a uniform suspension prior to dispensing.

QUALITY CONTROL SPECIFICATIONS

1. The powder is homogeneous, free flowing, and beige to greenish-beige.
2. Visually the prepared medium is green-yellow and opaque.
3. Expected cultural response after 40-48 hours at 35°C.

Organism	Growth	Colony Color
<i>Escherichia coli</i> ATCC® 25922	Partial Inhibition	Brown to Green
<i>Enterococcus faecalis</i> ATCC® 29212	Inhibition	-
<i>Salmonella typhi</i> ATCC® 19430	Growth	Black with metallic sheen
<i>Salmonella typhimurium</i> ATCC® 14028	Good	Black with metallic sheen

Storage Instructions:

On receipt, store the sealed bottle containing the dehydrated medium at 2 to 30°C. Once opened and recapped, place the container in a low humidity environment at the same storage temperature. Protect it from moisture and light. The dehydrated medium should be discarded if it is not free flowing or if the color has changed from the original beige or greenish-beige color.

