

Group B Streptococcus Agar

Cat No: **111015**

Intended Use

Group B Streptococcus (GBS) Agar is a chromogenic selective agar for the isolation, detection, and presumptive identification of *Streptococcus agalactiae* (Group B Streptococcus) from various specimens. The medium allows easy differentiation of GBS colonies through chromogenic or selective agents, facilitating rapid screening in diagnostic laboratories.

Principle

Group B Streptococcus Agar is formulated as a selective and differential medium that supports the growth of *Streptococcus agalactiae* (Group B Streptococcus) while inhibiting the growth of competing bacteria. The medium typically contains:

- Selective agents (such as antibiotics or bile salts) that suppress non-target flora, including Gram-negative bacteria and other Gram-positive organisms.
- Chromogenic substrates or dyes that react with specific enzymes produced by GBS, resulting in the formation of distinctively colored colonies. This color differentiation allows for the presumptive identification of GBS directly on the agar plate.
- Nutrient sources like peptones and blood or serum components provide essential growth factors required by GBS, which is a fastidious organism. This combination of selective inhibition and chromogenic differentiation makes GBS agar an effective tool for screening and isolating Group B Streptococcus from clinical specimens.

Storage

Recommended storage conditions: 2 to 8 °C. Avoid direct sunlight.
 Recommended shipping conditions: 2 to 8 °C.

Production Standard

The formulation is prepared according to the recommendations of the current European, United States, and China Pharmacopoeia.

Precautions

1. The product may secrete water when exposed to temperature changes between low and room temperature, which is normal. Allow it to reach room temperature before use and, if possible, pre-dry it in a sterile drying oven.
2. Handle the plates with sterile gloves to prevent contamination during use.
3. Store the plates in a cool, dry place away from direct sunlight to maintain their integrity.
4. Avoid opening the plates until they are ready to be used in the sampling area to prevent airborne contamination.
5. Ensure the plates are used within their expiration date to guarantee accurate results.
6. Dispose of used plates according to biohazard waste protocols to prevent contamination and ensure safety.

Quality Control

The following were incubated at 35 ± 2°C for 18-24 hours. The results are as follows:

Test Strains	Growth Result	Characteristic Reaction
<i>Streptococcus agalactiae</i> ATCC 13813	Good	Purple colonies
<i>Enterococcus faecalis</i> ATCC 29212	Good	Blue-purple colonies
<i>Escherichia coli</i> ATCC 25922	Inhibited	N/A

Product Content

Product Content	Cat No.	Size
Group B Streptococcus (GBS) Agar	111015	10 plates/bag; 200 plates/case

Composition

Peptone	17.5 g
Buffer mixture	2.50 g
Chromogenic mixture	2.54 g
Selective agent	0.11 g
Bacteriological agar	15.0 g
Water	1000 mL
Final pH (at 25°C)	7.3 ± 0.2

Shelf Life

Shelf life: 3 months from date of manufacture

Packaging

90mm x 10 plates per bag; 200 plates/case

Disposal

Please adhere to the respective regulations for the disposal of used culture medium (e.g., autoclave for 30 minutes at 121 °C)

Specially manufactured for:

Foster Medical Pte Ltd
 76 Pioneer Road, #03-05 Mapletree Pioneer Logistics Hub, Singapore 639577

