Sabouraud Dextrose Agar, Modified (Dextrose Agar Base, Emmons)

Intended Use
Sabouraud Dextrose Agar, Modified (Dextrose Agar Base, Emmons) is used in the conventional manner for cultivation of fungi.

Summary
Sabouraud Dextrose Agar is Carliers modifications of the formulation described by Sabouraud for the cultivation of fungi, particularly those associated with skin infections. Sabouraud Dextrose Agar Base, Modified is the modification of Sabouraud medium as described by Emmons. It has reduced dextrose content and a neutral pH. Though the low pH of this medium is favorable for the growth of fungi especially dermatophytes, some fungi are inhibited. Emmons modified the original formulation by adjusting the pH close to neutral to increase the recovery of fungi and by reducing the dextrose content from 40 to 20 g/L.

Principle
Peptone special is the source of nitrogenous growth factors. Dextrose provides as an energy source. The addition of antibiotics increases the selectivity of the medium. Chloramphenicol is inhibitory to a wide range of Gram-negative and Gram-positive bacteria, and cycloheximide is an antifungal agent that is active against saprophytic fungi and does not inhibit yeast or dermatophytes.

Formula*

Ingredients	**g/L**
Dextrose	20.0
Peptone Special	10.0
Agar	17.0
Final pH (at 25°C)	7.0 ± 0.2

*Adjusted to suit performance parameters.

Storage and Stability
Store dehydrated medium below 30°C in tightly closed container and the prepared medium at 2°C-8°C. Avoid freezing and overheating. Use before expiry date on the label. Once opened keep powdered medium closed to avoid hydration.

Specimen Collection and Handling
Ensure that all samples are properly labelled. Follow appropriate techniques for handling samples as per established guidelines. Some samples may require special handling, such as immediate refrigeration or protection from light, follow the standard procedure. The samples must be stored and tested within the permissible time duration. After use, contaminated materials must be sterilized by autoclaving before discarding.

Directions
1. Suspend 23.50 g of the powder in 500 mL purified / distilled water.
2. Heat to boiling to dissolve the powder completely.
3. Sterilize by autoclaving at 121°C (15 psi) for 15 minutes as per validated cycle. AVOID OVERHEATING.
4. Cool to 45°C-50°C and aseptically add the rehydrated contents of 1 vial of C C supplement (204031040005). Mix well before pouring in sterile petridishes.

Quality Control
Dehydrated Appearance: Cream to yellow coloured, homogeneous, coarse free flowing powder.
Prepared Appearance: Light amber coloured, clear to slightly opalescent gel forms in petridishes.
Cultural Response: Cultural characteristics observed with added CC Supplement, Modified after an incubation at 25°C-30°C for 2-3 weeks.

Organism (ATCC)	Growth
Candida albicans 3147 (10231)	Complete Inhibition
Saccharomyces cerevisiae NRRL Y-567 (9763)	Partial inhibition
Aspergillus brasiliensis WLRI 034(120) (16404)	Complete Inhibition
Escherichia coli (25922)	Complete Inhibition
Trichophyton rubrum (28191)	Good
Trichophyton mentagrophytes (9533)	Good

Performance and Evaluation

Performance of the product is dependent on following parameters as per product label claim:

1. Directions
2. Storage
3. Expiry

Warranty

This product is designed to perform as described on the label and package insert. The manufacturer disclaims any implied warranty of use and sale for any other purpose.

Reference

1. Carlier G. I. M., 1984, Brit. J. Derm. Syph., 60:61
2. Sabouraud R., 1892, Ann. Dermatol. Syphil. 3 : 1061.
3. Emmons C., Binford C, Uty J. and Kwon-Chung, 1970, Medical Mycology, 2nd Edi, Philadelphia: Lea and febiger.
4. MacFaddin J. F., 1985, Media for Isolation-Cultivation-Identification-Maintenance of Medical Bacteria, Vol. 1, Williams and Wilkins, Baltimore
5. Ajello, George, Kaplan and Kaufman, 1963. CDC laboratory manual for medical mycology. PNS Publication No.994 U.S Government Printing office, Washington, D.C
6. Murray P. R., Baron J. H., Pfaller M. A., Jorgensen J. H. and Yolken R. H., (Ed.), 2003, Manual of Clinical Microbiology, 8th Ed., American Society for Microbiology, Washington, D.C.
7. Lorian (ed.) 1996. Antibiotics in laboratory medicine, 4th ed. Williams and Wilkins, Baltimore, Md.
8. Data on file: Microxpress®, A Division of Tulip Diagnostics (P) Ltd.

Product Presentation:

Cat No.	Product description	Pack Size
201190050500	Dehydrated Culture Media	500 g