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Product Information

M8427 MacConkey Agar without Crystal Violet with 0.15% Bile Salts

MacConkey Agar without Crystal Violet with 0.15% Bile Salts is a differential medium recommended for the selection and recovery of the *Enterobacteriaceae* and related enteric gram negative bacilli.

Composition:

Ingredients	Grams/Litre
Peptic Digest of Animal Tissue	17.0
Proteose Peptone	3.0
Lactose	10.0
Bile Salts	1.5
Sodium Chloride	5.0
Neutral Red	0.03
Agar	15.0
Final pH 7.1 +/- 0.2 at 25°C	

Store prepared media below 8°C, protected from direct light. Store dehydrated powder in a dry place in tightly-sealed containers at 2-25°C.

Appearance: Pinkish beige colored, homogeneous, free flowing powder.
Gelling: Firm
Color and Clarity: Orange red colored, clear to slightly opalescent gel forms in petri plates.

Directions:
Suspend 51.53 g of MacConkey Agar without Crystal Violet with 0.15% Bile Salts in 1000 ml of distilled water. Heat to boiling, with gentle swirling to dissolve the agar completely. Sterilize by autoclaving at 15 lbs. pressure (121°C) for 15 minutes. Avoid overheating. Cool to 45-50°C and pour into sterile petri plates.

Principle and Interpretation:
MacConkey Agar without Crystal Violet with 0.15% Bile Salts is recommended for use in microbiological examination of foodstuffs and for direct inoculation of water samples for coliform counts. Gram-negative bacteria usually grow well on this medium and are differentiated by their ability to ferment lactose. Lactose fermenting strains grow as red or pink. The red color is due to the production of acid from lactose. *Shigella* and Salmonella are colorless and transparent.

Cultural characteristics after 18-24 hours at 35°C.

Organisms (ATCC)	Growth	Colour of Colony
Enterobacter aerogenes (13048)	+++	pink
Escherichia coli (25922)	+++	pink to red
Proteus vulgaris (13315)	+++	colorless
Salmonella enteritidis (13076)	+++	colorless
Sallmonella typhi (6539)	+++	colorless
Shigella flexneri (12022)	++	colorless
Enterococcus faecalis (29212)	++	pale pink to red
Staphylococcus aureus (25923)	-	-

References:

1. Compendium of Methods for the Microbiological Examination of Foods, (1985). Speck, M. ed. 2nd Edition. APHA. Washington, D.C.
2. Standard Methods for the Examination of Water and Wastewater, (1992). Greenberg, A.E., et al., eds. 18th Edition. APHA. Washington, D.C.