

MRS-IM Agar + Maltose



Medium used for the isolation and cultivation of Lactobacilli in food, faces and other samples.

• CONTENTS (Liter)

Tryptone	10.0 g
Yeast Extract	5.0 g
Dipotassium Phosphate	2.6 g
Sodium Acetate	3.0 g
Ammonium Citrate	2.0 g
Magnesium Sulfate	0.1 g
Manganese Sulfate	0.05 g
Maltose	20.0 g
Agar	13.0 g
Tween 80	1.0 g
Final pH = 6.9 ± 0.2 at 25°C	

• PROCEDURE

Suspend 56.75 G of powder in 1 L of distilled or deionized water. Heat to boiling until completely dissolved. Sterilize by autoclave at 121°C for 15 minutes. Cool to 45 - 50°C in water bath. Mix well. Pour into petri dishes.

• INTERPRETATION

MRS-IM Agar + Maltose is a medium used for the isolation and cultivation of Lactobacilli in food, faces and other samples. Tryptone and yeast extract provide nitrogen, carbon, amino acids and minerals. Dipotassium phosphate is the buffering agent. Sodium acetate and ammonium citrate are the selective agents. Magnesium sulfate and manganese sulfate is a cofactor for many metabolic reactions. Maltose is the carbohydrate. Agar is the solidifying agent. Tween 80 provides growth factors for the growth of Lactobacilli.

• TECHNIC

Inoculate the specimen using a sterile loop to the medium. Incubate at 36 ± 1°C for 3 days under microaerobic condition. Refer appropriate references for recommended test procedure.

• QUALITY CONTROL FOR USE

Dehydrated medium

Appearance: free-flowing, homogeneous

Color: light beige

Prepared medium

Appearance: slightly opalescent

Color: light amber

Incubation conditions: 36 ± 1°C / 3 days under microaerobic condition

Microorganism	ATCC	Inoculum CFU	Growth
<i>Lactobacillus acidophilus</i>	4356	50-100	good
<i>Lactobacillus bulgaricus</i>	11842	50-100	good
<i>Lactobacillus fermentum</i>	9338	50-100	good

• STORE

The powder is very hygroscopic. Store the powder at room temperature, in a dry environment, in its original container tightly closed and use it before the expiry date on the label. Store prepared medium at 2 - 8°C.

• REFERENCES

1. Sharpe M.E. (1960) Lab. Practice 9: 223-227.
2. Briggs, M. (1953). J. Dairy Res. 20:36.

• PACKAGE

Cat. No : MB-M1067 MRS-IM Agar + Maltose	500 G
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