B1450	BACILLUS CEREUS SELECTIVE AGAR BASE (MYP)
Formula	
Ingredients:	**gms/lit.**

ISO specifications: MYP

Ingredients	g / L
Enzymatic digest of casein	10.000
Beef extract	1.000
D-Mannitol	10.000
Sodium chloride	10.000
Phenol red	0.025
Agar	12.0-18.0
Polymyxin B sulphate	50,000 units
Egg yolk emulsion	100.00ml
Final pH	7.2±0.2

B1450 -Bacillus cereus Selective Agar Base (MYP)

Ingredients	g / L
Enzymatic digest of casein	10.00
Meat Extract B	1.00
D-Mannitol	10.00
Sodium chloride	10.00
Phenol red	0.025
Agar	15.00

Equivalent to Beef extract

2 vials of sterile Polymyxin B Sulphate (BF005)

Polymyxin B sulphate **50,000 units**

100 ml sterile Egg Yolk Emulsion (BF003)

Egg yolk emulsion **100.00ml**

Final pH 7.2±0.2

Final pH (at 25°C) : 7.2 ± 0.2

Directions :

Suspend 46.03 gram in 900 ml purified / distilled water. Heat to boiling to dissolve the medium completely. Sterilize by autoclaving at 15 lbs pressure (121°C) for 15 minutes. Cool to 45-50°C. Aseptically add rehydrated contents of 2 vials of sterile Polymyxin B sulphate Selective Supplement (BF005) solution and 100 ml sterile Egg Yolk Emulsion (BF003). Mix well and pour into sterile Petri plates.

Principle :

It contains Enzymatic digest of casein and Meat Extract B, which provide nitrogen source. Mannitol fermentation can be detected by phenol red, which yields yellow colour to the mannitol fermenting colonies due to acid production. Added egg yolk emulsion helps in differentiation of lecithinase producing colonies, which are surrounded by a zone of white precipitate. Addition of Polymyxin B Sulphate (BF005) helps to restrict growth of gram-negative bacteria such as Escherichia coli and Pseudomonas aeruginosa. These differentiating media allow differentiation of B.cereus from other Bacillus species by its inability to ferment mannitol and poor sporulation. Some strains of Bacillus cereus have very weak egg yolk reaction.

QC Tests – (I)Dehydrated Medium		
	Colour :	Light yellow to pinkish purple
	Appearance :	Homogeneous Free Flowing powder
(II)Rehydrated medium		
	pH (post autoclaving/heating) :	7.2 ± 0.2
	Colour (post autoclaving/heating) :	A) Basal medium: Red B) (After addition of 5% egg yolk emulsion): Light orange
	Clarity (post autoclaving/heating) :	A) Clear to slightly opalescent B) Opaque
(III)Q.C. Test Microbiological		
	Cultural characteristics observed with added Egg Yolk Emulsion (BF003) and Polymixin B Selective Supplement (BF005) after incubation at 30 ± 1°C for 24 ± 3 to 44 ± 4 hours.	

	MICROORGANISM (ATCC)	**GROWTH**	**Characteristic reaction**
	Bacillus subtilis (ATCC 6633)	luxuriant	yellow colonies with precipitation halo
	Escherichia coli (25922)	Inhibition	-
	Bacillus cereus ATCC 11778	luxuriant	Pink colonies with precipitation halo
Precautions :	1. For Laboratory Use.		
	2. Follow proper, established laboratory procedures in handling and disposing of infectious materials.		
Limitations:	1. Individual organisms differ in their growth requirement and may show variable growth patterns on the medium.		
	2. Each lot of the medium has been tested for the organisms specified on the COA. It is recommended to users to validate the medium for any specific microorganism other than mentioned in the COA based on the user's unique requirement. It is advised to transfer the suspected colonies to a fresh medium to visualize the true reaction.		
Use:	Recommended for the isolation and identification of Bacillus species and pathogenic Staphylococci. The composition and performance criteria of this medium are as per the specification laid down in ISO 7932:2004/ Amd 1:2020, ISO 11133:2014 (E) & Amd: 2020.		
Storage :	Dehydrated medium-below 30°C Prepared medium- Between 2 to 8°C.		
Packing :	500 gm. bottle		

Product profile:	Reconstitution	Quantity on Preparation (500g)	pH (25°C)	Supplement	Sterilization
B1450	46.03 g/l	9.776 L	7.2 ± 0.2	PolymyxinB Selective Supplement (BF005) 100 ml of sterile Egg Yolk emulsion (BF003)	121^0C / 15 minutes