

# **Technical Data Sheet**

ACBA001 Columbia Agar

Columbia Agar is used for detection of *Clostridium sporogenes* from pharmaceutical products in accordance with the microbial limit testing harmonized methodology.

Composition	Ingredients Gms / Litre
Peptone from Casein	10.000
Peptone from Meat	5.000
Heart Extract	3.000
Extract from Yeast	5.000
Starch	1.000
Sodium Chloride	5.000
Agar – agar	13.000

#### **Appearance:**

Yellow to Light amber Colour Columbia agar in 90 mm Petri Plates

### pH (at 25°C):

7.10 to 7.50

#### **Principle:**

Columbia Agar is prepared as per the formulation in EP and is in accordance with the microbial limit testing harmonized methodology of USP/BP/EP/JP. This medium is recommended to check the presence of Clostridium in non-sterile products like food, dietary, nutritional supplements related products. The genus Clostridium belongs to the family Clostridiaceae in the class Clostridia.

The product to be examined is initially enriched in Reinforced medium for clostridia. Columbia Agar is used as a base for media containing blood and for selective media formulations in which different combinations of antimicrobial agents are used as additives. This medium is highly nutritious as it contains Peptone from casein, Peptone from Meat, heart extract and yeast extract which supports rapid and luxuriant growth of fastidious as well as non-fastidious organisms. Sodium chloride maintains osmotic balance of medium. starch acts as an energy source and also neutralizes toxic metabolites if produced.

It is used in detection of Clostridia from pharmaceutical products. Clostridia grows under anaerobic conditions as gram positive rods giving a catalase negative test. Further confirmation is carried out by identification tests

## **Quantity of Medium**

30ml of medium in 90mm plates

## Dose of Gamma irradiation

12to 17 KGy

#### **Cultural Response**

Cultural characteristics observed by using standard ATCC cultures after an incubation 48 hours at  $30\text{-}35^{\circ}\text{C}$  and recovery should be greater than 70%.



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# **Sterility Test:**

Passes release criteria.

## **Shelf Life and Storage Conditions:**

Use before expiry date on the label and store below 25°C.

## **Reference Pharmacopoeia:**

USP/EP / BP / JP