

# TECHNICAL DATA SHEET

## CHOCOLATE AGAR PLATES

P90/CHO (TSA) - 20

### INTENDED USE

Chocolate Agar is an enriched medium for the isolation and cultivation of fastidious micro-organisms especially *Neisseria* and *Haemophilus* species.

### TYPES OF SAMPLE

- Clinical

### PRINCIPLE

Tryptic soya agar is used as a base for preparation of Chocolate agar plates. *Neisseria gonorrhoeae* is a gram-negative bacterium and the causative agent of gonorrhea. *Gonorrhoeae* is a bacterial pathogen responsible for gonorrhea and various sequelae that tend to occur when asymptomatic infection ascends within the genital tract or disseminates to distal tissues. The combination of casein and soy peptones in TSA renders the medium highly nutritious by supplying organic nitrogen, particularly amino acids and longer-chained peptides. The sodium chloride maintains osmotic equilibrium. Agar is a solidifying agent. Hemoglobin provides X factor (hemin) for *Haemophilus* species and V factor (nicotinamide adenine dinucleotide, NAD) for *Haemophilus* species.

### INGREDIENTS

Approximate Formula Per Liter	
Pancreatic digest of casein	15.0 g
Agar	15.0 g
Papaic digest of soyabean	5.0 g
Sodium Chloride	5.0 g
Sheep Blood	5 – 7%
Final pH 7.3 ± 0.2 at 25°C	

## PHYSICAL PARAMETERS OF PREPARED PLATES

- Appearance: 90 mm petri plates with a smooth surface and absence of any particles, cracks, or bubbles.
- Colour: Chocolate colour
- Clarity: Opaque
- Volume: 20-22 ml

## STERILITY CHECK

Sterility of the plates is checked by incubating the plates at 35-37°C for 3 days.

## MICROBIAL PERFORMANCE DATA

Culture characteristics observed after inoculating 50-100 CFU and incubate at 35-37°C for 24-48 hours. Examine plates after 24 to 48 h for amount of growth, colony size. If material is being cultured directly from a swab, roll the swab over on the agar surface and streak for isolation.

To improve detection of all pathogens contained in the specimen, it must also be streaked onto appropriate selective media.

Test Strains	ATCC No.	Growth
<i>Haemophilus influenzae</i>	ATCC 10211	Good
<i>Neisseria gonorrhoeae</i>	ATCC 43069	Good
<i>Neisseria meningitidis</i>	ATCC 13090	Good
<i>Streptococcus pneumoniae</i>	ATCC 6305	Good
<i>Streptococcus pyogenes</i>	ATCC 19615	Good

## LIMITATIONS & COMPLEMENTARY TESTS

Chocolate Agar is an enriched medium, thus non-pathogenic organisms may overgrow pathogenic bacteria.

## PRECAUTIONS

- For in-Vitro diagnostic use. Read the label details and storage before opening the pack.
- Wear protective gloves / protective clothing / eye protection / face protection.
- Follow good microbiological lab practices while handling specimens and culture.

## **PACK SIZE AND PACKAGING**

20 plates per kit packed with gamma irradiated packing material.

## **STORAGE & SHELF LIFE**

- Store at 10 -15 °C.
- Use before the expiry date mentioned on the label.
- Product is temperature sensitive; protect from direct sunlight, excessive heat, moisture, and freezing.

## **DISPOSAL**

User must ensure safe disposal by autoclaving and/or incineration of used or unusable preparations of this product. Materials that have come in contact with infectious / clinical samples must be decontaminated and disposed of in accordance with current laboratory techniques and regulations.

## **REFERENCE**

- Carpenter, C.M., and H.E. Morton. 1947. An improved medium for isolation of the gonococcus in 24 hours. Proc. N.Y. State Assoc. Public Health Labs. 27:58-60.
- BD Raw Material Technical literature.