

# Product Name : Columbia C.N.A. Agar Base

Selective medium for *staphylococci*, *streptococci* and *pneumococci* isolation.

## TYPICAL FORMULA (G/L)

Peptospecial .....23.0  
Starch ..... 1.0  
Sodium Chloride ..... 5.0  
Agar .....14.0  
Colistin .....0.01  
Nalidixic Acid .....0.015  
Final pH = 7.3 ± 0.2 at 25°C.

## DIRECTIONS

Suspend 43.02 G of powder in 1 L of distilled or deionized water. Heat until completely dissolved. Sterilize in autoclave at 121°C for 15 minutes. Cool to 45-50°C. Add 5% Sheep Blood Defibrinated (MB-S1876). Mix well. Dispense in petri dishes.

## DESCRIPTION

Columbia C.N.A. Agar Base is a selective medium for the isolation of *staphylococci*, *streptococci*, *pneumococci*.

## TECHNIQUE

Inoculate the medium with the specimen using a sterile loop and incubate at 36 ± 1°C for 18-24 hours on 10% CO<sub>2</sub> atmosphere.

## QUALITY CONTROL

### Dehydrated medium

Appearance: free-flowing, homogeneous.

Color: beige.

### Prepared medium

Appearance: opaque.

Color: cherry red.

Incubation conditions: 36 ± 1°C / 18-24 hours / 10% CO<sub>2</sub> .

Microorganism	ATCC	Growth	characteristics
<i>Streptococcus pyogenes</i>	19615	good	beta
<i>Streptococcus pneumoniae</i>	6303	good	alpha
<i>Staphylococcus aureus</i>	11204	good	beta
<i>Proteus mirabilis</i>	12453	markedly inhibited	

---

## Product Name : Columbia C.N.A. Agar Base

---

### PERFORMANCE AND LIMITATIONS

Colistin and nalidixic acid inhibit the growth of the Gram negative bacteria. The presence of blood allows to demonstrate the haemolytic characteristics of *streptococci*. Hemolytic reactions of some strains of Group D *streptococci* have been shown to be affected by differences in animal blood. Such strains are beta –hemolytic on horse and rabbit blood agar and alpha-hemolytic on sheep blood agar. *Proteus* species occasionally grow on C.N.A. Agar and may initially be confused with *streptococci* because of the small size of the colonies.

### STORAGE

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 or until signs of deterioration or contamination are evident. Store prepared plates at 2-6°C.

### REFERENCES

1. Ellner, P.D., C.J. Stoessel , E. Drakeford , and F. Vasi (1986). A New Culture Medium for Medical Bacteriology. Am. J. Clin. Path. 45, 502-504.
2. Ruoff , K.L.(1995). Streptococcus, p.299-305. In Manual of clinical Microbiology, 6th ed. American Society for Microbiology, Washington,D.C.
3. NCCLS document (1996) M22-A2: Approved Standard.

### PACKAGING

Cat. No : MB-C1113 Columbia C.N.A. Agar Base	500 G
---	-------