

Medium used for the isolation and cultivation of Salmonella spp. from pharmaceutical products. *Equally use with USP and EP.

• CONTENTS (Liter)

Yeast Extract	3.0 g
L-Lysine	5.0 g
Xylose	3.5 g
Lactose	7.5 g
Sucrose	7.5 g
Sodium Desoxycholate	2.5 g
Ferric Ammonium Citrate	0.8 g
Sodium Thiosulfate	6.8 g
Sodum Chloride	5.0 g
Agar	13.5 g
Phenol Red	0.08 g
Final pH = 7.4 \pm 0.2 at 25°C	

PROCEDURE

Suspend 55.18 G of powder to 1 L of destilled or deionized water. Heat to boiling until completely dissolved. DO NOT AUTOCLAVE. Cool to 45 - 50°C in water bath. Mix well. Pour into petri dishes.

INTERPRETATION

XLD (Xylose Lysine Desoxycholate) Agar (KP) is a medium used for the isolation and cultivation of Salmonella spp. from pharmaceutical products. Yeast extract provides nitrogen and vitamins. L-Lysine is the amino acid. Xylose, lactose and sucrose are sources of fermentable carbohydrates. Sugar fermentation produces acid and results in color change of phenol red indicator to yellow. Sodium desoxycholate inhibits Gram-positive microorganisms. Ferric ammonium citrate and sodium thiosulfate are components of H₂S indicator system. Sodium chloride maintains the osmotic balance. Agar is the solidifying agent.

TECHNIC

Inoculate the specimen using a sterile loop to the medium. Incubate at 30 - 35°C for 18 - 48 hours. Refer appropriate references for recommended test procedure.

• QUALITY CONTROL FOR USE

Dehydrated medium Appearance: free-flowing, homogeneous Color: light pink <u>Prepared medium</u> Appearance: slightly opalescent Color: light red Incubation conditions: 30 - 35°C / 18 - 48 hours

Microorganism	ATCC	Inoculum CFU	Growth	Characteristics
Salmonella typhimurium	14028	50-100	good	red colonies with black centers

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. Taylor, W.I. (1965). Am. J. Clin. Pathol. 44(4) : 471-475.
- 2. Pollock, H.M., and B.J. Dahlgren (1974). Appl. Microbiol. 27(1): 197-201.
- 3. Refer to the KP, USP and EP.

PACKAGE

Cat. No : MB-X1060P XLD (Xylose Lysine Desoxycholate) Agar (KP)

500 G

