

Lecture No5

B. cereus

Deserve species mention. This species is most likely to cause opportunistic infection, which suggest avirulence intermediate between that of B. anthracis and other species.

Anthrax isolated from abscess has been shown to produce a destructive pyogenic toxin. B. cereus can also cause food poisoning by means of enterotoxins. One enterotoxin acts by stimulating adenyl cyclase production and fluid excretion in the same manners as toxigenic E. coli and Vibrio cholera. Lecithinase production by B. cereus on egg yolk agar by the opaque zone of precipitation around the bacterial Indian ink formation, stain with Indian ink the capsule resistant to staining. The capsule appears as halo the simple between

Capsule stain

Grow the organism on skim milk agar to promote capsule formation, stain with Indian ink the capsule resistant to staining. The capsule appears as halo between the simple-stained cells and the negative-stained background.

Spore staining

End spore in cell appears unstained ovals in the center of stained cells. Acillary, Gram negative rods morphology

Add malachite green, rinse with water and then add safranin.