Enterobacter

Is a genus of common Gram negative bacteria, facultatively anaerobic, rod-shaped, non-spore-forming bacteria of the family Enterobacteriaceae. Several strains of these bacteria are pathogenic and cause opportunistic infections in immunocompromised (usually hospitalized) hosts and in those who are on mechanical ventilation. The urinary and respiratory tracts are the most common sites of infection. The genus Enterobacter is a member of the coliform group of bacteria. It does not belong to the fecal coliforms (or thermotolerant coliforms) group of bacteria, unlike Escherichia coli, because it is incapable of growth at 44.5°C in the presence of bile salts. Some of them showed quorum sensing properties as reported before.

In adult bacterial meningitis, the implicated pathogens, starting with the most frequent, included Enterobacter species (Enterobacter cloacae, Enterobacter aerogenes) ¹⁾.

Klebsiella pneumoniae, Enterobacter cloacae and Escherichia coli were the most frecuent Gramnegative bacillary meningitis after cranial surgery or trauma in adults ²⁾.

The most common pathogen was Escherichia coli (5 cases), followed by Enterobacter cloacae (3), Staphylococcus aureus (3), and Chryseobacterium meningosepticum (3) in nosocomial bacterial meningitis in children ³⁾.

Nosocomial neuroinfections due to Enterobacteriaceae represented 9.5% in a cohort of 171 cases of paediatric meningitis within last 15 years. Commonest etiologic agents was E. coli - 9 (50%) followed by Klebsiella pneumoniae - 3 (16,7%) and Enterobacter cloacae. Citrobacter freundii, Proteus mirabilis and Salmonella enteritidis (1 each). Commonest risk factors were neonatal age 13 - (72.2%), very low birth weight 5 (27.8%), craniocerebral trauma - 4 (22.2%) and neurosurgery - 5 (27.8%). All but 1 case were treated with antibiotics: 8 with III-rd and 3 with IV-th generation cephalosporins (ceftazidim, cefotaxim and cefepim) 2 with meropenem and 4 with ciprofloxacin: Nosocomial meningitis due to enterobacteriaceae was associated with significantly high mortality (29.9% vs. 15.1% in all cohort of pediatric meningitis - p<0.02) 4).

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