

## Endocarditis Caused By Rare Organisms

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Endocarditis caused by rare organisms is no longer a rarity now. Different reports have been issued regarding the incidence of these rare organisms in cases of bacterial endocarditis. They have been compiled in this article, giving a list of rare organisms which can cause infective endocarditis.

### Haemophilus parainfluenza endocarditis:

Endocarditis caused by *Haemophilus parainfluenza* has been reported rarely, and most of the case reports were published in the pre-antibiotic era. However, it has been seen that *Haemophilus parainfluenza* may cause endocarditis more frequently than has been previously recognized. James Dahlgren (1) states the clinical factors and bacteriologic techniques, which facilitate recognition of this disease. *Haemophilus parainfluenza* needs carbon-dioxide and enriched media for isolation and is usually grown on subculture before the original broth culture appears cloudy. These organisms require Y but not X factor for growth. (1)

### Anaerobic bacteria:

Bacterial endocarditis, due to anaerobic bacteria, is relatively uncommon. In a review of anaerobic infections, these organisms were found to be responsible for 3.8 per cent of 1,498 cases of endocarditis. The vast majority of the isolates were anaerobic streptococci either pepto-streptococci or micro aerophilic streptococci. Nastro and Fainglod, (2), have collected 37 cases of endocarditis due to anaerobic gram-negative bacilli from the world literature. These authors stressed the association of endocarditis and bacteremia from local disease involving normal flora of the respiratory tract. (3)

### *Candida parapsilosis* endocarditis

*Candida* endocarditis has been associated with

open heart surgery, prolonged intravenous therapy and heroin addiction. The commonest species is *Candida parapsilosis* in 50 per cent of the cases.

Vegetations consisting of masses of fibrin containing large number of *Candida* with giant pseudomycelia are taken as characteristic of *Candida* species.

Previously reported cases of endocarditis have been based on the absence of clinical findings and negative blood cultures. Antifungal therapy alone may actually facilitate further embolization, by destroying adherent viable mycotic colonies, making them less capable of withstanding turbulent flow patterns. Therefore, surgery is usually done, using antifungal agents, to eradicate any microscopic foci of *Candida*. (4)

### Infective Endocarditis caused by *Rothia Dentocariosa*.

The genus *Rothia* was created by George and Brown in 1967 (5) to include members of the family Actinomycetaceae that resemble *Nocardia* and *Actinomyces* morphologically but differ in their physiology in cell wall constituents.

The occurrence of *Rothia dentocariosa* in the oral cavity is well established, but it has rarely been recognized as a human pathogen. The first reported case was described by Scharfen in 1975.

### The risk of Endothelial infection in adults with salmonella bacteremia

Arteritis and endocarditis are rare complications of salmonellosis. Three workers saw that 10 out of 105 patients with salmonella bacteremia had arteritis. (6)

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So this is an overview of the literature about the different rare organisms that have been cited to cause endocarditis.

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