

배양음성 복막염의 임상경과

서울대학교 의과대학 내과학교실 신장내과

이성우 · 윤현배 · 이향림 · 김동기 · 주권욱 · 김연수 · 안규리 · 한진석 · 김성권 · 오국환

Clinical Outcomes of Culture Negative Peritonitis in CAPD-associated Peritonitis

Seong-woo Lee, Hyun-Bae Yoon, Hyang Lim Lee, Dong ki Kim, Kwon-Wook Joo
Yon Su Kim, Curie Ahn, Jin Suk Han, Suhnggwon Kim, Kook-Hwan Oh

Department of Internal Medicine, Division of Nephrology Seoul National University College of Medicine, Seoul, Korea

Purpose : Peritoneal dialysis related peritonitis (PDP) is a leading cause of modality failure. Therefore, its prevention and treatment are very important in maintaining peritoneal dialysis (PD). In this retrospective study, we investigated on the clinical manifestation and the outcome of culture negative peritonitis, in comparison with the culture-proven bacterial peritonitis.

Methods : We reviewed 296 episodes of PDP between year 2002 and 2008 from 164 patients who were over 18 years. Peritonitis episodes with mixed bacterial infection, or eosinophilic peritonitis were excluded. Etiologic organisms, initial clinical manifestations, antibiotic treatment, and the clinical outcomes were analyzed.

Results : We classified PDP episodes as culture negative peritonitis (CNP, n=89), gram positive peritonitis (GPP, n=133), gram negative peritonitis (GNP, n=74), based on the microorganism identified within 72 hours after the diagnosis of PDP. In CNP, treatment failure, need for salvage antibiotic therapy, hospitalization and uneventful cure without catheter removal were 20.2%, 22.5%, 39.3% and 71.9%, respectively. In comparison with GPP, CNP showed a higher treatment failure (20.2% vs 7.5% p<0.01) and a more frequent need for salvage therapy (22.5% vs 11.3% p<0.05). However, there were no differences between CNP and GNP in the above parameters. From twenty one out of the total 89 episodes with no growth within 72 hours, the causative organisms were identified in a delayed or a repeated culture afterwards. These organisms were non-tuberculous Mycobacterium (NTM, n=3), fungus (n=3), M. tuberculosis (n=2), Enterococci (n=3), Corynebacterium (n=3), Streptococci (n=1), Erysipelothrix (n=1), methicillin-resistant coagulase negative staphylococci (n=1), Pseudomonas (n=1), Bacteroides (n=1), Haemophilus (n=1), Flavimonas (n=1) spp. These late growers, in comparison with the true CNP, were associated with a higher treatment failure (42.9% vs 13.2%, p<0.01), more frequent need for salvage therapy (52.4% vs 13.2%, p<0.01) and hospitalization (66.7% vs 30.9% , p<0.01). After exclusion of NTM, M. tuberculosis and fungus, no differences were observed in the treatment outcome between CNP and GPP.

Conclusion : Compared to GPP, CNP had a worse prognosis, which was similar to those of GNP. Therefore, a more meticulous care and aggressive treatment is warranted for CNP.

Key Words : 배양음성 복막염, 복막투석, 임상경과

Culture negative peritonitis, Peritoneal dialysis, Outcome