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برجاء التكرم بالموافقة على مجمل أبحاثي العلمية لتقديمها للجنة العلمية الدائمة (الأساتذة والأساتذة  
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Re-emerging of colistin for treatment of nosocomial pneumonia due to gram  
negative multi-drug resistant pathogens in critically ill patients

By

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### Abstract

**Background:** Gram-negative (G-ve) bacilli, particularly *Pseudomonas aeruginosa* and *Acinetobacter baumannii*, are important opportunistic multidrug-resistant (MDR) pathogens in hospitalized patients, contributing to their morbidity and mortality. These organisms may still keep their sensitivity to colistin and allowed its use for these selective therapeutic indications.

**Objectives:** The aim of the present study is to evaluate and compare the effectiveness and safety of both combined intravenous (i.v.) colistin with aerosolized colistin versus i.v. colistin alone in nosocomial pneumonia due to MDR G-ve pathogens in critically ill patients.

**Methods:** ٤٠ Patients were hospitalized in ICU due to different etiologies. These patients experienced nosocomial pneumonia. The pathogenic organisms were G-ve MDR bacilli and only susceptible to colistin. The first group received both i.v. colistin with aerosolized colistin versus (vs.) the second group who received i.v. colistin alone.

**Results:** Mortality was less in patients who received i.v. plus inhaled colistin.

**Conclusion:** Colistin is a reasonable safe last-line therapeutic alternative for pneumonia due to MDR G-ve pathogens. Aerosolized colistin may be considered as a useful adjunctive to i.v. colistin

بسم الله الرحمن الرحيم