Tropical Medicine 2017: Characterization of patients with Carbapenemaseproducing Pseudomonas Aeruginosa isolates in a medium level hospital in cha, Colombia - Tatiana Pacheco - University of La Sabana

Tatiana Pacheco¹, Julio C. Garcia² and Sara Arias³

University of La Sabana, Colombia

Presentation: Carbapenemics have been utilized as perhaps the antimicrobials against serious contamination by main Pseudomonas aeruginosa strains. The opposition against these antimicrobials presents a perplexing the study of disease transmission and regardless of contonous report of clinical and epidemilogical refreshes in numerous nations in Latin America and explicitly in Colombia, there are not many investigations. Objective: To depict the clinical qualities of patients with carbapenemase creating Pseudomonas aeruginosa disengages. Material and strategies Between January 2015 and April 2017, a spellbinding report has been performed. This examination included patients from 18 to 82 years of age with normal age of 52 years. Every one of them with carbapenemase-delivering Pseudomonas aeruginosa. Results: It has been reported 37 tainted patients; whose 93.1% had a background marked by anti-toxin treatment, the principle anti-toxin utilized was Meropenem in 48.64% of the patients treated. Among the announced diseases, the most regular was the urinary lot contamination in 29.73% of the patients, trailed by delicate tissue disease (24.32%), pneumonia and stomach sepsis in 10.81% of patients, then, at that point gadget related contamination, careful site disease, and bacteremia (5.41% each). 72.97% of the patients gave hospitalization in an emergency unit normal stay of 19 days. 29.7% of patients got monotherapy, 27.02% had twofold treatment, in 24.32% of the cases a triple treatment was followed and in the leftover 10.81% there was a routine of multiple anti-microbials. Mortality was 24.32%. Atomic examination was acted in 3 disconnected examples with affirmation of Pseudomona aeruginosa species and presence of carbapenemase type KPC and VIM in the three examples, proposing the presence of an equivalent clone in the foundation.

Pseudomonas aeruginosa segregate co-holding onto KPC and a metallo-β-lactamase (IMP-8) was as of late detailed in Puerto Rico [3] and secludes co-holding onto KPC and VIM quality were recognized in Colombia [1]. We depicted another clone of P. aeruginosa co-holding onto SPM-1 and KPC-2 that caused a flare-up in a Bone Marrow transplantation unit, and a seclude co-holding onto three carbapenemase (SPM-1; KPC-2 and VIM-2) that had a place with an alternate clone then past portrayed in two episodes that happened in this unit and were controlled with support of hand cleanliness and contact safeguards, one because of P. aeruginosa holding onto SPM-1 and other holding onto VIM-2 [18].

This P. aeruginosa disconnect holding onto KPC-2 was recognized without precedent for our medical clinic in 2011 in a hematopoietic undifferentiated organism relocated patient. It held onto three carbapanemase qualities (SPM-1, VIM-2 and KPC-2), and had a place with another clone (JA) not distinguished before in the medical clinic. This seclude showed a safe profile to both imipenem and meropenem with MIC of 64 μ g/mL and 32 μ g/mL, separately, however was defenseless to polymyxin and colistin with a MIC of 2 μ g/mL for the two medications.