Evaluation of Infection Control Adherence Among Health Care Workers at Hemodialysis Units

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Background: Patients with chronic renal insufficiency suffer from abnormalities of the immune system, making them more susceptible to infections. Renal disease patients and health care workers are at high risk for infection due to frequently repeated exposure to contaminants in dialysis units. The microbiological monitoring used for hemodialysis is extremely important, especially because of the debilitated immune system of patients suffering from chronic renal insufficiency. Objectives: The purpose of this study to investigate Infection Control Adherence among Health Care Workers at Hemodialysis Units.

Methods and Materials: The study was performed from Jun 2019 to 2019. Environmental and air samples were collected. The media used were nutrient agar for the total bacterial count, MacConkey agar for Gram-negative count. Colonial morphology, Gram staining and biochemical test were used for the identification and characterization of the microorganisms. Demographic, environmental, behavioral and some risk factors associated with the patients (N=205) and the HCW (N=32) in haemodialysis units were recorded in a separate questionnaire.

Results: The isolates were predominantly gram-negative bacteria, with Enterobacter being the most common followed by Staphylococcus spp. One isolate each of Klebsiella pneumoniae, Salmonella sp. and Citrobacter diversus was obtained. Only 80% of haemodialysis patients received hepatitis B vaccine. Adherence to infection control measures among health care workers was low in 31.2%, moderate in 34.4% and high in 34.4%.
**Conclusion:** The study showed low adherence to infection control measures among patients receiving maintenance HD and HCW in Gaza Strip.

**Keywords:** Hemodialysis units, Evaluation, Infection, Adherence, Gaza Strip, Palestine.