

The status of infection control measures in healthcare facilities in South Africa

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Introduction

South African healthcare workers (HCWs) are more than two times more likely to acquire TB than the general population. A KwaZulu-Natal study found that HCWs have a five to six-fold increased rate of hospital admission with DR-TB compared to non-healthcare workers. This study aimed to evaluate the impact of infection prevention and control (IPC) measures currently in place in South African healthcare facilities (HCFs) in reducing occupational TB amongst HCWs.

Methods

This cross-sectional study was conducted in nine public HCFs across three high TB burdened provinces. A self-reported infection prevention and control questionnaire was completed by designated healthcare personnel at each facility. This was coupled with a walkthrough inspection by the study team. The questionnaire gathered information on administrative, environmental, clinical, and occupational health measures. Data was cleaned and analysed using Stata 15.1. Descriptive analysis was applied to the categorical variables and was presented in percentages.

Results and Discussion

All nine HCFs received training on TB infection control plan from a competent person and provided the staff at risk with personal protective equipment. Eight of the nine (88.9%) facilities used N95 respirators, but only staff from TB hospitals had been fit tested. Natural ventilation was used in all TB and PHC facilities, with most also supplementing with other ventilation systems. Four air cleaning methods were in use amongst six facilities. Only one of the six non-TB specialized HCF was segregating TB patients, while four (66.7%) of these facilities isolated TB patients in separate rooms. A total of 37 HCWs (clinical and non-clinical) across all hospitals had been diagnosed with TB in the previous year, emphasising the need for IPC training for all staff including non-clinical staff.

Conclusion

Based on the evidence gathered from this study, 100% compliance to IPC measures has not been achieved across all four infection control measures.