UTILIZATION OF POST EXPOSURE PROPHYLAXIS AMONG HEALTH WORKERS FOLLOWING PERCUTANEOUS INJURIES IN PUBLIC HEALTH FACILITIES IN KAMPALA CAPITAL CITY

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DECLARATION

I,	ALIT	UBEE	RA	PHOEI	BE H	IILDA,	hereby	declare	that	the	work	subm	itted	in	this
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To my parents whose immeasurable sacrifice made this possible.

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List of acronyms

AIDS Acquired Immunodeficiency Syndrome

CDC Centres for Disease Control and Prevention

GBP Great Britain Pounds

Hep B Hepatitis B Virus

HIV Human Immunodeficiency Virus

HWs Health workers

IHK International Hospital Kampala

ICU Intensive Care Unit

KCCA Kampala City Council Authority

NRH National Referral Hospital

OBGY Obstetrics and Gynaecology

PCR Polymerase chain reaction

PEP Post Exposure Prophylaxis

PIs Percutaneous Injuries

SOPs Standard operating procedures

UBOS Uganda Bureau of Statistics

VIF Variance Inflation Factor

WHO World Health Organization

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Operational definitions

Percutaneous injuries for purposes of this study shall refer to puncture wounds and cuts inflicted by medical instruments intended for puncturing or cutting including cannulas, scalpels, burs that may be contaminated with patient's blood or other bodily fluids. It shall also include splash exposures also known as mucocutaneous injuries to patient's potentially contaminated body fluids including blood. Splash exposures for purposes of this study shall refer to non-intact skin and mucous membranes splash exposures to patient body fluids.

Health workers for purposes of this study shall refer to all clinical medical practitioners (doctors, nurses, clinical officers) and medical, paramedical and nursing students in clinical years namely 4th and 5th year for medical students, final year for nursing and paramedical students.

Post exposure prophylaxis utilization for HIV shall refer to timely uptake of treatment for HIV exposure following percutaneous injuries. This shall be defined as initiation of PEP within 72 hours following percutaneous injuries (Institute, 2014).

Post exposure prophylaxis utilization for Hepatitis B shall refer to timely uptake of treatment for Hepatitis B exposure following percutaneous injuries. This shall be defined as initiation of PEP within 72 hours following percutaneous injuries (Institute, 2014).

Uptake of PEP shall refer to commencement of consuming of the prescribed treatment.

Completion of treatment regimen shall refer to no self-report of any missed doze or vaccination shot following initiation.

ABSTRACT

Background: Of the 3 million percutaneous exposures that occur annually among health workers, 90% are in low income countries. The estimated prevalence of percutaneous exposures among health workers in Uganda is 57-82%. However, utilization of post exposure prophylaxis following percutaneous exposure remains largely undetermined.

Methods: This cross-sectional study aimed to determine the level of utilization of post exposure prophylaxis for HIV and Hepatitis B following percutaneous injuries among clinical health workers in public health facilities in Kampala Capital City and the associated determinants. A total of 709 Health workers of various cadres across various levels of health facilities in Kampala were included.

Results: 28% (n=709) of HWs had sustained percutaneous injuries in the preceding 12 months. 14% (n=197) of the exposed HWs had been immunised against Hep B. Prevalence of injuries was higher among HWs in lower level facilities (Adjusted prevalence ratio-APR 1.1, 95% CI 1.02-1.26) and International Hospital Kampala (APR 1.3, 95% CI 1.04-1.52). 15% (n=197) of the exposed HWs initiated HIV PEP and 0.5% Hep B PEP. 69% (n=29) completed HIV PEP treatment and 100% (n=1) completed Hep B PEP treatment. Being a consultant and having moderately deep injury were significantly associated with PEP uptake. 6 of 7 health facilities lacked a reporting procedure following percutaneous injury.

Conclusion: Health workers are vulnerable to blood borne pathogens across all levels of Health care institutions. Much as PEP for HIV is widely available across all Health facilities, PEP utilization is low. Comprehensive measures to ensure Health worker safety including mandatory Hep B immunisation and occupational exposure surveillance are called for.