ABSTRACT

Introduction: Cryptosporidiosis caused by a coccidian parasite is a common cause of chronic diarrhoea among people living with HIV.It is associated with devastating complications like severe acute malnutrition, severe dehydration, significant weight loss and inflammation of the gall bladder, liver or pancreas. The purpose of the study was to determine the prevalence of cryptosporidium infection and the risk factors associated with cryptosporidiosis among PLWHIV at Wakiso H/CIV.

Methods: We enrolled 231 HIV/AIDS patients on ART from July to September 2021. Stool samples were collected from study participants, wet saline preparations made and examined, stool samples concentrated using formal ether concentration, and smears stained using the modified Zeihls-Neilsen technique. Structured questionnaires were used to collect demographic data, patient-related factors and the common signs and symptoms that predisposed the study participants to cryptosporidiosis.

Results: Out of 231, 155 (67.09%) were females and 76 (23.67%) males. The age range was 5–67 years and mean age 34.16 years and the CD4 cell count distribution ranged from 100-800 cells /µl.ART was accessible for 206/231(89.18%). The overall prevalence of cryptosporidiosis was 21.21%. Cryptosporidium infection was found to be associated with animal rearing (p=0.020), duration on ART (p=0.008) with those who had been on ART for .>4 years mostly affected, low CD4 category (P=0.044) and dehydration (p=0.000). There was no significant association between cryptosporidiosis and educational background (P=0.149), marital status (P=0.125), religion (P=0.688), occupation (p=0.125, source of water (p=0.615), ART regimen(p=0.702), ART status(p=0.241), adherence level(p=0.681), diarrhoea(p=0.075), abdominal pain(p=0.596), vomitingp=0.171), nausea(p=0.439) and fever(P=0.940).

Conclusion:The prevalence got in this study was high compared to what was observed by other studies done in other parts of Uganda. There is a need for early diagnosis in order to fight the infection, a need to develop more sensitive and specific diagnostic techniques like molecular methods and a need to adopt cryptosporidium screening among the advanced HIV disease priority opportunistic infections

Key words: Cryptosporidiosis, HIV, ART, risk factors and prevalence