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**Presentation Title: M-1677 - Prevalence of Cryptococcal Antigenemia and Cost Effectiveness of Cryptococcal Screening in Vietnam**

Keywords: cryptococcosis; HIV/AIDS; screening

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**Abstract:** Background: An estimated 120,000 HIV-associated cryptococcal meningitis (CM) cases occur each year in Southeast Asia; early treatment may improve outcomes. The World Health Organization (WHO) recently recommended screening HIV-infected adults with CD4<100 for cryptococcal antigen (CrAg), a marker of infection that is detectable before CM, in areas of high CrAg prevalence. We evaluated CrAg prevalence and cost-effectiveness (CE) of CrAg screening in HIV-infected adults in northern and southern Vietnam. Methods: Serum samples were collected and stored during 2009-2010 in Hanoi and Ho Chi Minh City, Vietnam, from ART-naïve HIV-infected patients presenting to care in 4 clinics. All samples from patients with CD4<100 were tested using the CrAg lateral flow assay (IMMY). Demographic data were evaluated for association with CrAg positivity. We obtained cost estimates from clinicians and hospital administrators in Vietnam, and evaluated CE using WHO-CHOICE guidelines. Results: Sera from 294 patients were available for CrAg testing; 144 (49%) were from patients with CD4≤100. Among these 144, median CD4 count was 48 (range: 0 - 100) and median patient age was 31 years (range: 19 - 59); 107/142 (75%) were male. Forty-eight (33%) patients were from south Vietnam and 96 (67%) were from the north. Six (4%; 95% CI 1.7-8.5%) specimens were CrAg-positive. CrAg prevalence was higher in south Vietnam (4/48, 8%; 95% CI 2.7-18.9%) than in the north (2/96, 2%; 95% CI 0.35-6.7%) (p=0.10). Cost per life-year gained from screening at CrAg prevalences of 2%, 4% and 8% was \$148, \$121, and \$86, respectively. Conclusion: Among patients in this study, CrAg prevalence was higher in southern than northern Vietnam; however, CrAg screening would be CE in both regions. Public health officials in Vietnam should consider adding cryptococcal screening to existing guidelines for HIV/AIDS care.