

Title: Competency Test for Visual Inspection of Cervical Lesions with Acetic Acid (VIA).
Equatorial Guinea-Cervical Cancer Screening and Treatment Project

Authors: Farshid Meidany¹, Manuel Ondo², Erica Liebermann³, Kimberly McLeod¹, Luis Benavente¹

Affiliation: 1. Medical Care Development International; 2. Hospital General de Malabo, Equatorial Guinea; 3. Grounds for Health

As part of MCDI-Equatorial Guinea Cervical Cancer Screening and Treatment Project, a training on Visual Inspection with Acetic Acid was held in March 2017 in Malabo. Twenty six gynecologists, doctors, midwives and nurses, as well as relevant Ministry of Health managers, were trained. To assess participants' competency 36 printed images from JHPIEGO were used. The images were inspected prior to the training to ensure they were not pixelated or had poor resolution. Response sheets were entered into an Excel template that automatically assigned a score to each of the answers, aggregated for a general score for 4 competencies: identify cancer, diagnosis of VIA positive, identify Squamocolumnar Junction and identify correct management plan. The individual and occupational category scores were mainly affected by the fourth competency, management of the case. Possibly due to selection bias (i.e., due to recruitment being based on the recommendations of knowledgeable clinician very familiar with their prior work experience), the three auxiliaries showed a competence comparable to the rest. The 4 clinicians with largely managerial roles tended to perform better than the other participants, who saw patients in public facilities. At the group level, the highest competency corresponded to identification of cancer (86%), followed by seeing clearly the Squamocolumnar Junction (78%). The lowest competencies were in correctly classifying the images shown as VIA negative/positive (64%), and specifying the required treatment (none, cold coagulation, refer for cancer treatment) with only 50% correct. Regression analysis of the post-test knowledge score derived from a comprehensive final examination regressed on the competency score gave a linear regression coefficient of $R^2 = 0.8234$, indicating that the competency assessment was a good predictor of clinical knowledge. On average, a little more than a third (38%) of the participants obtained correct answers in all 4 questions. This indicates that at this early stage of the program it is more useful to analyze the 4 competencies separately and identify and prioritize the next training steps accordingly.