



AMPATH Consortium Brown University



Medical Exchange

Brown University joined the AMPATH (previously known as the ASSANTE) consortium in 1998. Since that time, 37 Moi students and 9 Moi Registrars have rotated to Brown. 38 Brown students and 55 Brown residents have traveled to study at Moi.



TB Care and Research



Kenya is one of the 13 high burden countries for TB and TB is the leading cause of death in patients living with HIV both in Kenya and globally. Dr. Jane Carter has worked with colleagues at Moi to develop community based active case finding models/programs, lessening transmission through early diagnosis. Moi was the first site in the country to provide community based MDR TB care – a policy now adopted at country level. Presently the recipient of two TB Reach grants, the TB Care and Projects office, under the management of Ms Lydia Kamle, is

now rolling out XPERT- the new rapid diagnostic test for TB -as well as establishing an innovative approach to childhood TB and prevention through the use of a Child Contact Register. To date over 100,000 symptomatic individuals have been screened through these programs.

HIV resistance



Dr. Kantor is the Director of Research for the Brown-Kenya Program. He has been working in Kenya for the past eight years with his Kenyan collaborators, Dr. Lameck Diero, the Moi University Chief of Medicine, Dr. Nathan Buziba, the AMPATH Reference Laboratory Director, and their teams. His research focuses on HIV drug resistance in patients never exposed to antiretroviral therapy and in those who are failing treatment; the development of simpler and cheaper methods for drug resistance testing,

to be used in resource limited settings; and methods for monitoring patients in settings where laboratory tests are limited. His work yields important policy-changes within AMPATH and provides novel and original data for the region as well as the whole country. Results from his recently completed study on treatment failure and drug resistance in patients failing advanced antiretroviral therapy are being used by AMPATH as well as by the Kenya National AIDS & STI Control Program, to assist in strategic planning for future antiretroviral therapy for HIV-infected patients.

Mental Health

Martin Keller, MD of Brown University is the lead of the AMPATH North American Mental health working group. Formed in 2006, the group comprised of 10 north American institutions seeks to coordinate and facilitate collaboration in both research and training in mental health at MUSOM. In 2011, MUSOM approved the first psychiatric residency program which will include international exchange, the first occurring with support from Care New England in May 2014. Ongoing activities of the MHWG include: quarterly conference calls, information sharing through our AIFresco Share website, and on-going communication with AMPATH leadership to build the Mental Health care, training and research programs.



Pulmonary



In 2009 Moi University became a Cardiopulmonary Center of Excellence in Clinical Research. Brown, under the leadership of Drs. Carter and Sherman, leads the pulmonary initiatives. Research studies have concentrated on the health effects of Household Air Pollution. Clinical work has focused on advancing



pulmonary training, development of a dedicated Chest Clinic, rollout of the Kenya Asthma guidelines, and registry and descriptive work in causes of dyspnea.

Fogarty AITRP

The Fogarty Aids International Training Program in Clinical Research at Brown is celebrating its 20th anniversary. For its last two grant cycles Moi University/Kenya has been included as part of the training program. Trainees are funded for their degrees once they have successfully been accepted under routine competition for their degree program.

Degree Candidates:

- Ann Mwangi – PHD Biostatistics, Brown University
- Edwin Sang – Masters Biostatistics, Brown University
- Winstone Nyandiko, MPH, Harvard University
- Lydia Kamle, Masters Business Administration (Research), Moi University
- Christine Chuani, Masters Research Administration, Emmanuel College
- Robert Rono, Masters Research Administration, Emmanuel College
- Kipurto Kirwa, PHD Epidemiology, Brown University
- Sylvia Shangani, Masters Behavioral and Social Sciences Intervention, Brown University
- Evon Okidi, Masters Biostatistics, Brown University
- Nicholas Kirui, MMED, Moi University
- Rose Kosgei, MSc, Clinical Trials, London School of Tropical Medicine

Short-term training at Brown University:

- Hillary Mabaye
- Rose Kosgei
- Esther Nabakwe
- Orang'o Omenge



Substance Abuse

Dr. Rebecca Papas, together with Dr. Benson Gakinya (Kenyan Site PI) lead a 5-year randomized clinical trial funded by the National Institute of Alcohol Abuse and Alcoholism to test the efficacy of a group behavioral intervention called Cognitive Behavioral Therapy (CBT) to reduce alcohol use among 400 AMPATH HIV-infected patients who report a minimum of hazardous or binge drinking. The study is called Reduce Alcohol First in Kenya Intervention or "RAFIKI," which means "friend" in Kiswahili. CBT is being compared against a group health education intervention called Healthy Lifestyles. Participants are being randomized to one of the 6-session weekly group interventions and followed for 9 months post-intervention. The primary outcome will be alcohol use measured by self-report continuously throughout the study, as well as by objective saliva tests. The study is in its 3rd year.



Biostatistics Core

Dr. Joseph Hogan leads the Biostatistics Core for the AMPATH consortium. The goals of the core are: To provide biostatistical support to AMPATH researchers as well as to the NHLBI funded Cardiopulmonary Center for Clinical Research at Moi, to provide specific training and collaboration in the area of pulmonary disease and complications associated with TB, to provide collaboration and training in the area of biostatistics, particularly in support of the proposed COE research projects and to work to identify funded training opportunities for Kenyan investigators.

Diabetes



Less than a decade ago, diabetes in western Kenya carried the same level of mortality as untreated HIV. Dr. Bud Kahn, by arranging the donation of a hemoglobin A1C monitor, kick started the diabetes program and has followed up that initial donation with ongoing support through on site training as well as further donation of supplies. Today, the Moi University diabetes program cares for over 1000 patients at both Moi University and 3 peripheral sites.

HIV/Cervical Cancer

Brown, through our Fogarty training program, has trained 2 Ob-Gyn physicians (Drs. Mabeya and Omenge) in cervical cancer screening and treatment. A Fogarty supplement to Drs. Cu-Uvin and Mabeya showed high rates of cervical neoplasia (47%) among HIV infected women and that visual inspection with acetic acid (VIA) is as good as conventional Pap smears for screening. A CFAR supplement to Drs. Cu-Uvin and Omenge found that the disease negative rate after VIA and cryotherapy (negative VIA, normal Pap smear, negative HR HPV) at ≥ 6 months was 35% (CI=31-40%). Only 2.5% (CI=1.2-4.5%) had persistently abnormal testing on all 3 tests. A significant proportion (65%) continued to have at least one abnormal test. Follow-up with VIA agrees reasonably well with Pap smear and HR HPV tests. The disease negative rate after VIA and immediate cryotherapy (35%) among HIV-infected women in our study is less than previously reported for non-infected women (85-88%). The program has screened over 19,000 women since its inception in 2009.



CFAR

The Center for AIDS research has funded several projects at Moi, including "Sexual Health Risks and HIV Prevalence in Street-Involved Youth in Western Kenya" (Susanna Winston) and "Social Health Insurance for HIV Prevention and Treatment in Kenya" (Omar Galarraga)

