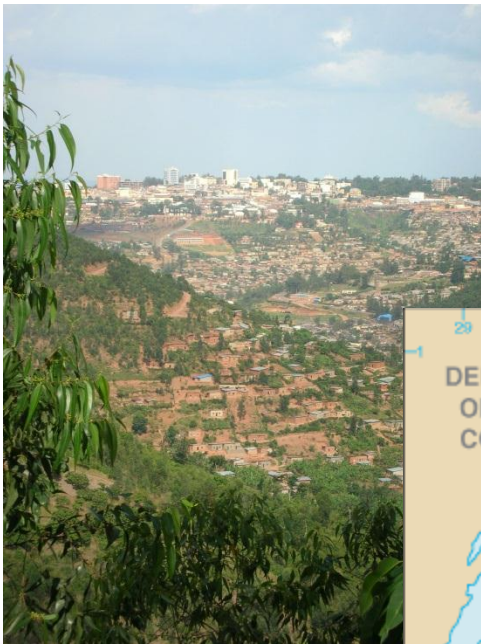


Teaching Math In Rwanda

Spring Semester 2007



Werner Horn, Susan Taylor, Carol Shubin, Jennifer Wright



Some Rwandan Population Stats

Population: 9,907,509

Age structure: 0-14 years: 41%
15-64 years: 57%
65 years and over: 2%

Median age: total: 18.6 years

Population growth rate: 2.8%

Life expectancy: 49 years

Total fertility rate: 5.4 children born/woman

Major infectious diseases: degree of risk: very high
food or waterborne diseases: bacterial diarrhea,
hepatitis A, and typhoid fever
vectorborne disease: malaria

HIV/AIDS adult prevalence 5% (2003 est.)

Note Rwanda is the most densely populated country in Africa

Source: 2007 CIA Factbook

Economy

- Per capita income ~ \$1000
- 90% agricultural
- 8%+ inflation

Kigali Institute of Science and Technology (KIST)

- Established 1997 to address the acute shortage of technical personnel
- Offers degrees in Engineering, Applied Science, Technical Education and Entrepreneurship
- 3% of population has access to tertiary education



Science 3 Building

KIST Curriculum

- Very high standards; much more ambitious than CSUN's math curriculum
- Passing requires 50% - if a student fails they must repeat the year
- Students spend 30-40 hours a week in class
- Almost all classes are taught in English
- Grand vision – lack of faculty makes it hard to implement

Students



- Students go through college in cohorts
- Bright, motivated, and hard working
- Most first year students are francophones
- Government supported students (25,000FRW~\$50 per month for room, board, supplies, and transportation)
- Privately supported students
 - Tuition cost per semester ~ \$1200*
- Most students skip meals to get by
- Student housing crisis
- Few students have access to the internet
- Most students have no books

Faculty and Staff

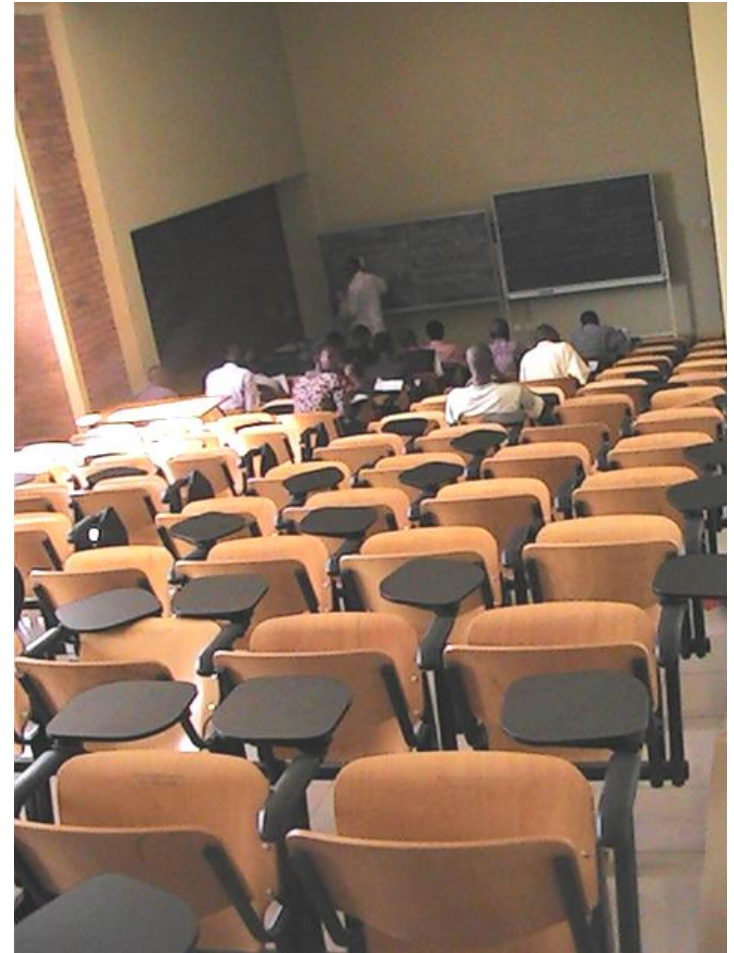


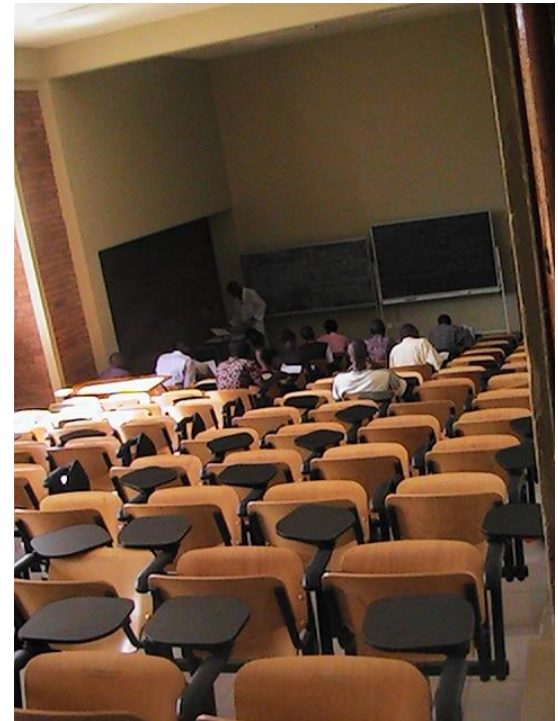
- Disparity in pay scale between Rwandans and expats
- Rwandans study abroad often don't return
- Math dept is under-staffed, only 2 PhDs in math, majority of staff is expat
- Poor communication within the department and the university
- Large classes and heavy teaching loads, little assistance for grading, etc.



Infrastructure

- Poor light or glare , poor acoustics, leaking ceiling
- One free standing blackboard, if any
- Inaccessible computer lab
- No textbooks, little photocopying
- Lack of organization and communication



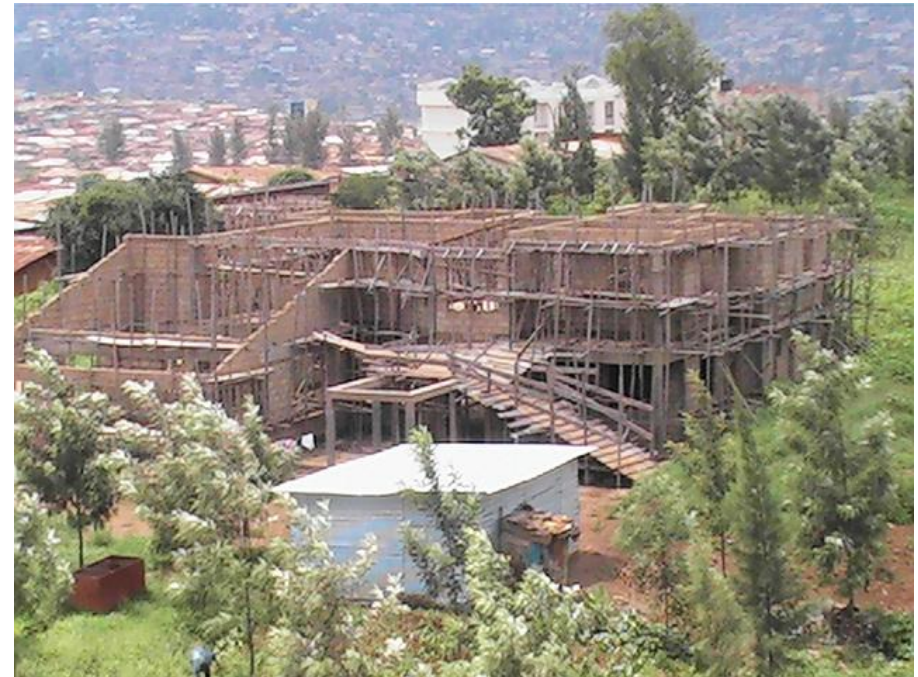


Administration

Direct control of the University by the President Kagame. The Senate approves the curriculum.

Foreign aid from the UK, Netherlands, and Japan funds the university

Incoming expat faculty have no idea what the structure of the university is – there is no directory or orientation.



Future

KIST is still a new university and it is having growing pains. Good leadership will steer it in the right direction.

More online classes, expand the African Virtual University

Look for more partnerships in the East African Community and global partnerships

MOU with CSUN? It would be great!

Thanks to Fulbright for a very interesting
experience!

Thanks to Justine Su