Academics without Borders
USF-AWB
Universitaires sans Frontières

Quarterly Newsletter, 22, June 2016.

Newsletter

Following calls for tender related to the Polytechnic University of Bobo-Dioualasso, Burkina-Faso, 120 applications in different areas were received. The selected missionaries will take place in the following months. In this issue, we present an excerpt from the report of the mission carried out in information technology by Professor Rached Bousselma of the University of Tunis., Tunisia.

In this issue, you will also find a presentation of a software tool (MOOC) for training in medical imaging, this training could be useful in many countries.

Finally, our Canadian colleagues are looking for a specialist in geology/Earth sciences for the Kyrgyzstan. ■

Prof. Robert Laurini, president of USF-AWB.

Report of mission carried out from June 19 to July 2, 2016 in Bobo Dioulasso, Burkina Faso, by Professor Rached Bousselma, University of Tunis

Context and objective of the mission

Under the cooperation agreement signed in November 2014 between the NGO "Universitaires Sans Frontières/Academics Without Borders "(USF-AWB)[1] and the Polytechnic University of Bobo-Dioulasso, and in response to the needs of support expressed by the latter, in particular by the School in Information Technology (ESI), I was selected to teach the course of Geomatics at Master level in computer science and from 20 June to 2 July 2016.

Bobo-Dioulasso is located 356 km South-West of the capital Ouagadougou (about 5:30 by the car).

All practical work and courses took place in the Computing Center in the city. The lectures were given in a hall in the Higher Institute for Health.

The 2nd year of Master includes 19 students. Attendance was good overall. The participation and interest of students in the field of geomatics were very satisfactory. The majority of these students presents rapid assimilation of the transmitted concepts and learning skills.

[1] For any contact: Pr. Robert Laurini, President of USF-AWB, Informatique, INSA de Lyon, F- 69621 Villeurbanne; Email: Robert.Laurini@insa-lyon.fr. Web site: http://www.usf-awb.org. Association according to French laws, established on January 2, 2010.

Any educational materials (six courses Powerpoint presentations, presentation Powerpoint of the conference and the twelve sheets of practical work (a fact sheet introduction and eleven sheets of manipulation)) were given to the students on CD media.

Assessment

The planned schedule did not anticipate evaluation during the two weeks of teaching session. This evaluation will be programmed by the administration of ESI soon. To do this, a quiz in the form of multiple choice was handed on CD to the direction of the school. Copies of the students will be scanned and sent by email for the notation.

Recommendations

Taking account of the number of hours allocated to teaching (20 hrs of course and and 20 hrs of practical training), students profile and their expectations lead me to make the following two recommendations:
(1) to rename the course of geomatics as follows: Geo-Informatics or design of geographic information systems (GIS)
(2) to focus education on GIS and the Webmapping.

Conclusion

The mission has gone well. The effort should be continued to help the task force to provide quality training.

Thanks

The mission was made possible thanks to the NGO USF-AWB in the context of its Program of cooperation with the Polytechnic University of Bobo-Dioulasso in Burkina Faso. Are strongly acknowledged:
-Officials of the NGO, particularly its President, Professor Robert Laurini.
-Those responsible for the ESI school, particularly its Director, Professor Mesmin Dandjinou, for the remarkable organization of the mission (home to arrival at Ouagadougou airport despite the late hour, reservation and transfer to the host house of the University of Ouagadougou, reservation of the returnticket and transfer to the bus station for the as destined for Bobo-Dioulasso) home on arrival in Bobo-Dioulasso and transfer to the host House of the Polytechnic University of Bobo-Dioulasso all days except Sunday, June 26, located in the city, support for travel by a driver)
The missionary expresses his gratitude to the staff of the ESI school whose availability was greatly appreciated. ■

Prof. Mohamed Rached Boussema, University of Tunis.

Training in Medical Imagery

ImageMed is a MOOC (Massive Open On Line Course) open to all. During ten weeks, the basic physics of the different clinical imaging modalities and the basis of medical image interpretation will be taught. This MOOC has been set-up by a team of doctors and physicists, radiologists and nuclear physicians, of the Claude Bernard University and the Lyon Hospitals, with financial support from the Claude Bernard University of Lyon.
The first session took place from March to end of May 2016. This first session was attended by about 200 participants from various cursus, from the medical students, through the manipulators in radiology, physical therapists, veterinarians, biologists, chemists, computer scientists, medical secretaries but also patients. It allowed many very informative discussions between participants and teachers, especially on clinical cases filed by teachers and participants themselves. Despite the variety of the participants, all participants reported benefited from this MOOC. The Veterinary School of Lyon should add to the basic core of this MOOC specific modules for veterinary medicine. Greater involvement of electro-radiology manipulators schools should also be put in place.
This open online course proposes to explain the basics of medical imaging.
After an introduction, 4 main modules are addressed to evoke both the physical principle of each imaging modality, and the first elements for image analysis.

Will thus be addressed:
• radiological *x*-ray imaging with among others the X-ray scanner;
• the two-dimensional ultrasound and Doppler imaging;
• Magnetic resonance imaging or MRI
• and Nuclear Medicine with conventional scintigraphy and Positron Emission Tomography (PET or PET-scan).

Notions about radiation and diagnostic strategy will also be addressed.

At the end of the MOOC, you will be able to:
- Explain the physical and detection principles for the four imaging modalities;
- Know the basics of clinical image interpretation;
- Know the limits, advantages and cons-indications in different ways.

To achieve this training, you will have at your disposal:
- Videos which important points to remember;
- Handouts;
- Interesting web links on the topic addressed;
- Practical work to be done;
- A forum of questions and answers but also of clinical cases;
- A hang-out (interactive courses via the Web) for the different modalities;
- Quizzes and assessments corrected by peers.

It takes about 2-3 hours a week to assimilate knowledge.
From our experience working with the second year of medicine for several years, this course is a basic introduction to medical imaging, will address:
- curious;
- patients who have had to spend these examinations;
- Medicine to students just before the ECN; internal; general practitioners;
- medical students;
- students in dentistry, midwifery, physiotherapy, ergo too.

The language of the MOOC training is French.
To register, please refer to: http://mooc.univ-lyon1.fr/resource/open/text/26933. ■

Prof. Marc Janier, Claude Bernard Université of Lyon

Position for Advisor in Geology/Earth Science in Kyrgyzstan

Our Canadian sister association (AWB-USF) is pleased to make the following announcement.

Academics Without Borders-Universitaires sans frontières (AWB-USF) is a Canadian bi-lingual NGO based in Montreal, the mission of which is to support academic institutions in developing countries in building capacity in higher education so that they can train their own experts and conduct research to assist in their development. AWB-USF fulfills its mission by sending volunteers on projects that originate in and are owned by developing world institutions. AWB-USF reimburses volunteers for their expenses but does not offer them a salary.

Job Reference: Professor of Geology/Earth Science
Number of Volunteers: 1
Partner Organisation: American University of Central Asia (AUCA)

Founded in 1993, AUCA develops future leaders for the democratic transformation of Central Asia. American University of Central Asia is an international, multi-disciplinary learning community in the American liberal arts tradition. Its curriculum includes the Preparatory Program (New Generation Academy), fourteen undergraduate majors and four graduate programs. In addition to its top-flight academic programs AUCA is committed to freedom of expression, critical inquiry, and academic honesty. AUCA is the first university in Central Asia to offer US accredited degrees in liberal arts programs through a partnership with Bard College in the United States. In addition to Bard, AUCA maintains partnerships with a number of universities and organizations worldwide.
Job Title: Geology/Earth Science Advisor
Location: Bishkek, Kyrgyzstan
Language: English

Job Description:
Responding to the growing demand in the region, AUCA is in the process of developing a program in Geology/Earth Science. AUCA is seeking a volunteer to provide assistance to the faculty of the developing program. The main focus of the volunteer will be to assist the faculty and staff to engage in the activities necessary to achieve the projects objectives. These activities will include, curriculum development and co-teaching, faculty recruitment, and the development of summer and semester fieldwork programs.
Specifically, the role of the volunteer will be to;

- Work with the faculty to develop a robust undergraduate geology/earth science curriculum within the standards of Kyrgyz Ministry of Education and focused on the needs of regional employers in geology and earth science industries.
- Train faculty in the new curriculum and provide teaching mentorship in a co-teaching format.
- Work with the human resources department to develop recruitment standards and actively recruit local and foreign faculty.
- Work with the International Office to develop summer and semester programs for local, regional and international students to pursue fieldwork in geology in Kyrgyzstan to increase the diversity of the student body and research profile of AUCA.

Requirements
Educational Qualifications: Advanced Degree in Geology/Earth Science/Environmental Science
Professional Experience: Minimum of ten years teaching experience in Geology or Earth Sciences at the University level and expertise with the design and implementation of fieldwork programs for students. Experience with mentoring of new faculty and research supervision of students will be considered an asset.
Start date and Duration:
The volunteer will begin as soon as possible and will spend a minimum of one semester (September to December 2016/January-May 2017) at AUCA with the option of continuation for a second semester.
Benefits:
All expenses; flights, accommodations, local transportation, travel and medical insurance, vaccinations and medications, and other incidentals will be covered by AUCA and AWB-USF.
Applications:
Please send CV, Letter of Motivation, Dates and Duration of Availability, and the Names and Contact Details of Two References to Corrie Young, cyoung@awb-usf.org

Deadline:
August 1, 2016. Applications received before the deadline will be considered immediately. ■
